

FED. SUPPLY CLASS

5305

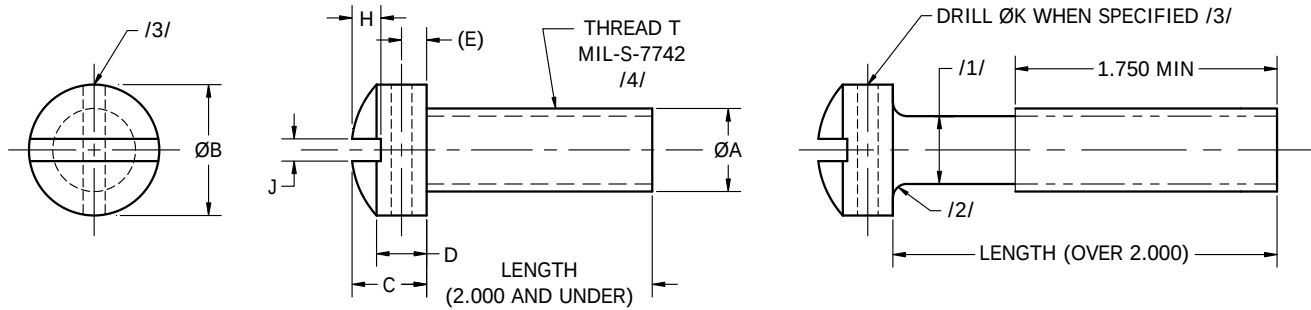


TABLE I – DIMENSIONS

T THREAD UNF-2A	ØA MAX	ØB		C		D		(E) I/6	H		J		ØK DRILL +.004 -.001
		MAX	MIN	MAX	MIN	MAX	MIN		MAX	MIN	MAX	MIN	
NO. 0-80	.0600	.096	.083	.054	.045	.038	.029	-	.024	.014	.031	.020	-
NO. 1-72	.0730	.118	.103	.066	.057	.046	.037	-	.029	.019	.033	.022	-
NO. 2-64	.0860	.140	.124	.083	.070	.062	.055	.026	.030	.022	.031	.025	.031
NO. 3-56	.0990	.161	.145	.095	.082	.070	.064	.030	.034	.026	.035	.027	.037
NO. 4-48	.1120	.183	.166	.107	.094	.070	.072	.035	.038	.030	.030	.031	.037
NO. 5-44	.1250	.205	.187	.120	.106	.088	.081	.028	.042	.033	.043	.035	.046
NO. 6-40	.1380	.226	.208	.132	.118	.096	.089	.043	.045	.035	.048	.039	.046
NO. 8-36	.1640	.270	.250	.156	.141	.113	.106	.043	.065	.054	.054	.045	.046
NO. 10-32	.1900	.313	.292	.180	.165	.130	.123	.043	.075	.064	.060	.050	.046
1/4-28	.2500	.414	.389	.237	.219	.170	.161	.062	.102	.087	.075	.064	.062
5/16-24	.3125	.518	.490	.295	.276	.211	.201	.078	.130	.110	.084	.072	.070
3/8-24	.3750	.622	.590	.355	.333	.253	.242	.094	.154	.134	.094	.081	.070

MATERIAL:

CARBON STEEL – TYPE FS1010 (UNS G10100) PER ASTM A 108 QQ-S-637, 60 KSI MINIMUM TENSILE STRENGTH OR OTHER STEEL MEETING THE SAME PHYSICAL REQUIREMENTS.
 CRES – AMS QQ-S-763, CLASS IV, MIL-S-7720, COMPOSITION FM OR S FOR COLD UPSETTING PROCESS, OR NON-MAGNETIC EQUIVALENT.
 CRES – TYPE 302 (UNS S30200), 304 (UNS S30400), 316 (UNS S31600), AND 303 SE (UNS S30300) PER AIR4127 FEDERAL STANDARD NO. 66.
 BRASS – COMMERCIAL, 55 KSI MINIMUM ULTIMATE TENSILE STRENGTH.

FINISH:

CARBON STEEL – CADMIUM PLATE, AMS-QQ-P-416, TYPE I, CLASS 3.
 CRES – PASSIVATE.
 BRASS – NONE.

① COMPLETELY REVISED

THE INITIAL RELEASE OF THIS DOCUMENT SUPERSEDES AN501, REVISION G. PART NUMBERS REMAIN AN501.

THIRD ANGLE PROJECTION	CUSTODIAN NATIONAL AEROSPACE STANDARDS COMMITTEE	REVISION 1
PROCUREMENT SPECIFICATION FF-S-92	TITLE SCREW, MACHINE, FILLISTER HEAD, FINE THREAD	CLASSIFICATION PART STANDARD
		NASM501 SHEET 1 OF 3

CODE:

PLAIN DASH NUMBER INDICATES CARBON STEEL.
ADD "A" BEFORE FIRST DASH NUMBER FOR DRILLED HEAD.
ADD "B" BEFORE FIRST DASH NUMBER FOR BRASS.
~~ADD "C" BEFORE FIRST DASH NUMBER FOR CRES. NOT TO BE USED FOR NEW DESIGN.~~
ADD "D" BEFORE FIRST DASH NUMBER FOR CRES.

EXAMPLES OF PART NUMBER:

~~AN501-6-8 = NO. 6-40 UNDRILLED CARBON STEEL, SCREW, 1/2 INCH LONG. /5/~~
AN501A10-8 = NO. 10-32 DRILLED CARBON STEEL SCREW, 1/2 INCH LONG.
AN501AB10-8 = NO. 10-32 DRILLED BRASS SCREW, 1/2 INCH LONG.
~~AN501B6-8 = NO. 6-40 UNDRILLED BRASS SCREW, 1/2 INCH LONG. /5/~~
~~AN501AC10-8 = NO. 10-32 DRILLED CRES SCREW, 1/2 INCH LONG.~~
AN501AD10-8 = NO. 10-32 DRILLED CRES SCREW, 1/2 INCH LONG.

NOTES:

- /1/ THE DIAMETER OF THE UNTHREADED PORTION SHALL NOT BE LESS THAN THE MINIMUM PITCH DIAMETER NOR MORE THAN THE MAXIMUM MAJOR DIAMETER OF THE THREAD.
- /2/ THE RADIUS OF THE FILLET AT THE BASE OF THE HEAD SHALL NOT EXCEED ONE-HALF THE PITCH OF THE SCREW THREAD.
- /3/ DRILLED HOLE TO BE ON CENTER APPROXIMATELY AT RIGHT ANGLES TO THE SLOT BUT MUST NOT BREAK THROUGH THE BASE OR TOP (SPHERICAL PORTION) OF THE HEAD.
- /4/ FOR MACHINE SCREWS 2 INCHES LONG AND SHORTER, THE COMPLETE THREADS SHALL EXTEND TO WITHIN TWO THREADS OF THE BEARING SURFACE OF THE HEAD OR CLOSER IF PRACTICABLE. SCREWS OF LONGER LENGTH SHALL HAVE A MINIMUM COMPLETE THREAD LENGTH OF 1-3/4 INCHES.
- /5/ ALL FILLISTER HEAD SCREWS WITH UNDRILLED HEADS, AND SIZES NO. 0-80 THRU NO. 8-36 INACTIVE FOR DESIGN AFTER 12 MAY 1950. NO SUPERSEDING STANDARD. FOR DESCRIPTION OF STATUS NOTES, SEE NAS380.
- /6/ REFERENCE DIMENSIONS ARE FOR DESIGN PURPOSES ONLY AND ARE NOT AN INSPECTION REQUIREMENT.
- (7) AN501D SCREWS CAN UNIVERSALLY REPLACE AN501C SCREWS OF LIKE THREAD SIZE AND LENGTH; BUT THE AN501C SCREWS CANNOT UNIVERSALLY REPLACE THE AN501D SCREWS.
- (8) REMOVE ALL BURRS AND SHARP EDGES.
- (9) DIMENSIONS IN INCHES AND APPLY AFTER FINISH UNLESS OTHERWISE SPECIFIED.
- (10) THIS STANDARD TAKES PRECEDENCE OVER DOCUMENTS REFERENCED HEREIN.
- (11) UNLESS OTHERWISE SPECIFIED, PART INVENTORY MANUFACTURED TO PREVIOUS REVISIONS OF THE APPLICABLE DRAWING OR SPECIFICATION MAY BE PROCURED AND USED UNTIL STOCK IS DEPLETED.
- (12) OTHERWISE SPECIFIED HEREIN, REFERENCED DOCUMENTS SHALL BE THE ISSUE IN EFFECT ON DATE OF MANUFACTURE. HOWEVER, EXISTING MATERIAL INVENTORY CERTIFIED TO A PREVIOUS REVISION OF THE APPLICABLE MATERIAL SPECIFICATION(S) IS ACCEPTABLE FOR USE UNTIL DEPLETION.
- (13) DIMENSIONING AND TOLERANCING PER ANSI Y14.5M-1982.

① COMPLETELY REVISED

REVISION

1

NAS501
SHEET 2



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