

FED. SUPPLY CLASS

5305

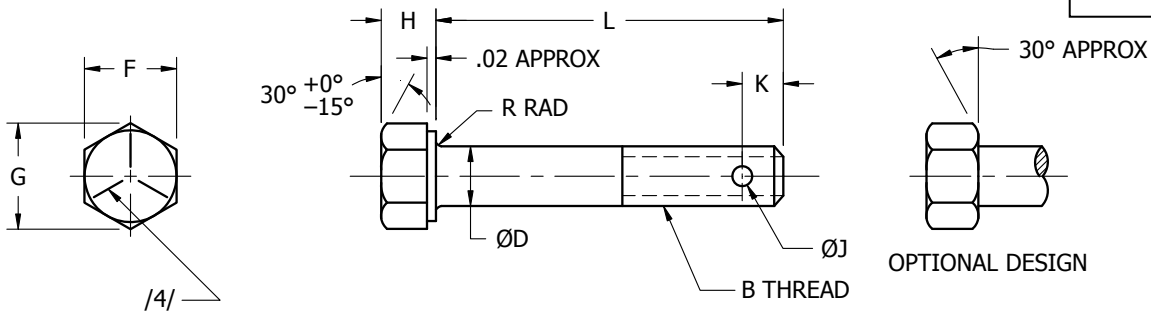


TABLE I - DIMENSIONS

NOMINAL SIZE	B THREAD UNC-2A	ØD BODY		F WIDTH ACROSS FLATS		G WIDTH ACROSS CORNERS		H HEAD HEIGHT		ØJ HOLE +.006 -.002	K ±.010	R RAD		MIN TENSILE STRENGTH LBF
		MAX	MIN	MAX	MIN	MAX	MIN	MAX	MIN			MAX	MIN	
1/4	20	.2500	.2450	.4375	.4280	.505	.488	.163	.150	.076	.109	.025	.015	3,800
5/16	18	.3125	.3065	.5000	.4890	.577	.557	.211	.195	.076	.125	.025	.015	6,300
3/8	16	.3750	.3690	.5625	.5510	.650	.628	.243	.226	.107	.156	.025	.015	9,300
7/16	14	.4375	.4305	.6250	.6120	.722	.698	.291	.272	.107	.156	.025	.015	12,800
1/2	13	.5000	.4930	.7500	.7360	.866	.840	.323	.302	.107	.172	.025	.015	17,000
5/8	11	.6250	.6170	.9375	.9220	1.083	1.051	.403	.378	.140	.188	.045	.020	27,100
3/4	10	.7500	.7410	1.1250	1.1000	1.299	1.254	.483	.455	.140	.219	.045	.020	40,100
7/8	9	.8750	.8660	1.3125	1.2850	1.516	1.465	.563	.531	.140	.250	.065	.040	55,400
1	8	1.0000	.9900	1.5000	1.4690	1.732	1.675	.627	.591	.140	.250	.093	.060	72,700

MATERIAL:

MEDIUM CARBON STEEL, GRADE 5, IN ACCORDANCE WITH PROCUREMENT SPECIFICATION.

HEAT TREATMENT:

DEVELOP BASIC MATERIAL PROPERTIES AS FOLLOWS, WITH CONTROLS PER AMS2759: 120 KSI FTU.

FINISH:

CADMIUM PLATING IN ACCORDANCE WITH PROCUREMENT SPECIFICATION.

CODE:

THE PART NUMBER CONSISTS OF THE BASIC PART NUMBER, PLUS THE DASH NUMBER.

EXAMPLE OF PART NUMBER:

MS51105-301

① COMPLETELY REVISED

THE INITIAL RELEASE OF THIS DOCUMENT SUPERSEDES MS51105, REVISION D. PART NUMBERS REMAIN MS51105.

THIRD ANGLE PROJECTION	CUSTODIAN NATIONAL AEROSPACE STANDARDS COMMITTEE	REVISION 1
PROCUREMENT SPECIFICATION FF-S-85	TITLE SCREW, CAP, HEXAGON HEAD, FINISHED HEXAGON BOLT, SHANK DRILLED FOR COTTER PIN, STEEL, GRADE 5, CADMIUM PLATED, UNC-2A	CLASSIFICATION PART STANDARD
		MS51105 SHEET 1 OF 3

NOTES:

- (1) THE THREADS SHALL BE IN ACCORDANCE WITH FED-STD-H28.
- (2) MINIMUM THREAD LENGTH SHALL BE TWICE THE DIAMETER PLUS 1/4 INCHES. THE TOLERANCE SHALL BE PLUS 3/16 INCHES OR 2 1/2 THREADS, WHICHEVER IS GREATER. ON SCREWS THAT ARE TOO SHORT FOR MINIMUM THREAD LENGTHS, THE DISTANCE FROM THE BEARING SURFACE OF THE HEAD TO THE FIRST COMPLETE THREAD SHALL NOT EXCEED THE LENGTH OF 2 1/2 THREADS.
- (3) DIMENSIONS IN INCHES AND APPLY AFTER FINISH UNLESS OTHERWISE SPECIFIED.
- /4/ HEADS SHALL BE MARKED IN ACCORDANCE WITH MIL-HDBK-131. RAISED MARKINGS ARE PREFERRED, STAMPINGS ARE ACCEPTABLE.
- (5) THIS STANDARD TAKES PRECEDENCE OVER DOCUMENTS REFERENCED HEREIN.
- (6) UNLESS OTHERWISE SPECIFIED, PART INVENTORY MANUFACTURED TO PREVIOUS REVISIONS OF THE APPLICABLE DRAWING OR SPECIFICATION MAY BE PROCURED AND USED UNTIL STOCK IS DEPLETED.
- (7) UNLESS 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.
- (8) DIMENSIONING AND TOLERANCING PER ANSI Y14.5M-1982.

TABLE II – LENGTHS

NOMINAL SIZE			1/4	5/16	3/8	7/16	1/2	5/8	3/4	7/8	1
L LENGTH	TOLERANCE		DASH NUMBERS								
	SIZE 3/4 AND UNDER	SIZE 7/8 AND OVER									
.375	+.000 -.031	-	301	327	-	-	-	-	-	-	-
.438			302	328	-	-	-	-	-	-	-
.500			303	329	355	-	-	-	-	-	-
.562			304	330	356	-	-	-	-	-	-
.625			305	331	357	-	-	-	-	-	-
.750			306	332	358	384	410	433	-	-	-
.875			307	333	359	385	411	434	-	-	-
1.000			308	334	360	386	412	435	457	-	-
1.250	+.000 -.062	+.000 -.125	309	335	361	387	413	436	458	482	506
1.500			310	336	362	388	414	437	459	483	507
1.750			311	337	363	389	415	438	460	484	508
2.000			312	338	364	390	416	439	461	485	509
2.250	+.000 -.094	+.000 -.188	313	339	365	391	417	440	462	486	510
2.500			314	340	366	392	418	441	463	487	511
2.750			315	341	367	393	419	442	464	488	512
3.000			316	342	368	394	420	443	465	489	513
3.250			317	343	369	395	421	444	466	490	514
3.500			318	344	370	396	422	445	467	491	515
3.750			319	345	371	397	423	446	468	492	516
4.000			320	346	372	398	424	447	469	493	517
4.250			321	347	373	399	425	448	470	494	518
4.500			322	348	374	400	426	449	471	495	519
4.750			323	349	375	401	427	450	472	496	520
5.000			324	350	376	402	428	451	473	497	521
5.500			-	-	-	-	429	452	474	498	522
6.000			-	-	-	-	430	453	475	499	523

① COMPLETELY REVISED

REVISION
1
NAS51105
SHEET 2



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