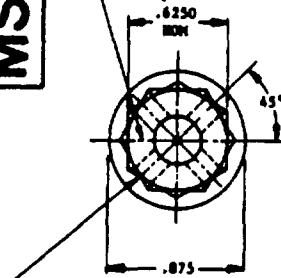


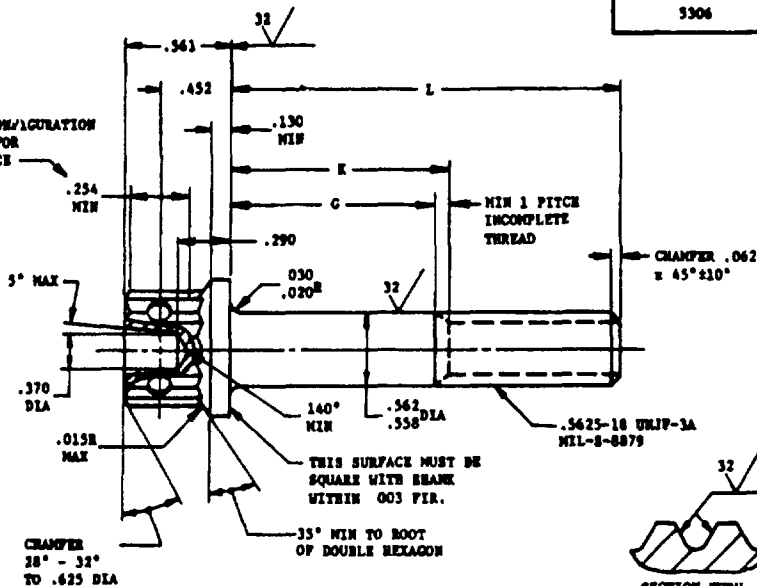
**MS9947**

MARK PART NUMBER  
AND MANUFACTURER'S IDENT  
PER AS 478 CLASS A

WRENCHING CONFIGURATION  
PER AS 870 FOR  
THIS DISTANCE



.070 DIA 4 HOLES  
EQUALLY SPACED AS SHOWN  
GSE 90° to .100 DIA



SECTION THRU  
THREAD PROFILE

PART NO	L	G MIN	K MAX	APPROX WEIGHT LB/100
MS9947-16	1.625	.079	.250	15.79
MS9947-17	1.688	.141	.312	16.23
MS9947-18	1.750	.204	.375	16.67
MS9947-19	1.812	.267	.438	17.10
MS9947-20	1.875	.329	.500	17.54
MS9947-21	1.938	.391	.562	17.98
MS9947-22	2.000	.454	.625	18.42
MS9947-23	2.125	.579	.750	19.30
MS9947-24	2.250	.704	.875	20.18
MS9947-25	2.375	.829	1.000	21.06
MS9947-26	2.500	.954	1.125	21.94
MS9947-27	2.625	1.079	1.250	22.81
MS9947-28	2.750	1.204	1.375	23.69
MS9947-29	2.875	1.329	1.500	24.67
MS9947-30	3.000	1.454	1.625	25.55
MS9947-31	3.125	1.579	1.750	26.33

PART NO.	L	G MIN	K MAX	APPROX WEIGHT LB/100
MS9947-32	3.250	1.704	1.875	27.21
MS9947-33	3.375	1.829	2.000	28.08
MS9947-34	3.500	1.954	2.125	28.96
MS9947-35	3.625	2.079	2.250	29.84
MS9947-36	3.750	2.204	2.375	30.72
MS9947-37	3.875	2.329	2.500	31.60
MS9947-38	4.000	2.454	2.625	32.47
MS9947-39	4.125	2.579	2.750	33.35
MS9947-40	4.250	2.704	2.875	34.24
MS9947-41	4.375	2.829	3.000	35.11
MS9947-42	4.500	2.954	3.125	35.99
MS9947-43	4.625	3.079	3.250	36.86
MS9947-44	4.750	3.204	3.375	37.74
MS9947-45	4.875	3.329	3.500	38.62
MS9947-46	5.000	3.454	3.625	39.50
MS9947-47	5.125	3.579	3.750	40.38
MS9947-48	5.250	3.704	3.875	41.25
MS9947-49	5.375	3.829	4.000	42.13

PART NO.	L	G MIN	K MAX	APPROX WEIGHT LB/100
MS9947-50	5.500	3.954	4.125	43.01
MS9947-51	5.625	4.079	4.250	43.89
MS9947-52	5.750	4.204	4.375	44.77
MS9947-53	5.875	4.329	4.500	45.64
MS9947-54	6.000	4.454	4.625	46.52

1. SHANK SHALL BE STRAIGHT WITHIN .002 TOTAL PER INCH OF BOLT LENGTH.
2. THE CONCENTRICITY OF THREAD PD IN RELATION TO THE SHANK SHALL BE WITHIN .006 FIR.
3. THE CONCENTRICITY OF THE SHANK IN RELATION TO THE WASHER FACE DIAMETER AND DOUBLE HEXAGON OD SHALL BE WITHIN .013 FIR.
4. MATERIAL: STEEL AMS 6322.
5. HARDNESS: ROCKWELL C26-32.
6. FINISH: CADMIUM PLATE AMS 2400. DIMENSIONS SPECIFIED ARE AFTER PLATING.
7. MANUFACTURING SPECIFICATION: AMS 7452 EXCEPT HEAD SHALL BE UPSET
8. HEAD TO SHANK FILLET SHALL BE COLD WORKED.
9. MAGNETIC PARTICLE INSPECTION PER AMS 2640 AFTER PLATING.
10. SURFACE TEXTURE: USAS 946.1-1962 UNLESS OTHERWISE SPECIFIED, SURFACES TO BE 125 MICROINCHES EXCEPT UPSET HEAD
11. BREAK SHARP EDGES .003- .015 UNLESS OTHERWISE SPECIFIED.
12. DIMENSIONS IN INCHES. UNLESS OTHERWISE SPECIFIED, TOLERANCES: LINEAR DIMENSIONS ±.010, ANGULAR DIMENSIONS ±5°.
13. DO NOT USE UNASSIGNED PART NUMBERS.

AS 4 AND ARE SOCIETY OF AUTOMOTIVE ENGINEERS, INC. PUBLICATIONS.  
THIS STANDARD WAS DEVELOPED COOPERATIVELY WITH THE MILITARY SERVICES BY THE SAE AEROSPACE PART STANDARDS DIVISION.

P.A.  
AIR FORCE - 11  
Other  
NAVY - AS

TITLE

BOLT, MACHINE - DOUBLE HEXAGON EXTENDED  
WASHER HEAD, DRILLED, FULL SHANK, STEEL  
AMS 6322, CADMIUM PLATED, .5625-18 UNJF-3A

MILITARY STANDARD

**MS 9947**

PROCUREMENT SPECIFICATION  
AMS-7452

SUPERSEDES

SHEET 1 OF 1

DD FORM 672-1 (limited coordination)  
AND use only

PREVIOUS EDITIONS OF THIS FORM ARE OBSOLETE

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User activities  
Navy - MC, CG

Aviation activities  
Air Force - 02  
Navy - AS

This military standard is approved by the Department of the Air Force and the Bureau of Naval Weapons and is mandatory for use by those activities. All other military activities are required to employ this standard where applicable.

APPROVED 30 Dec 70 REVISED