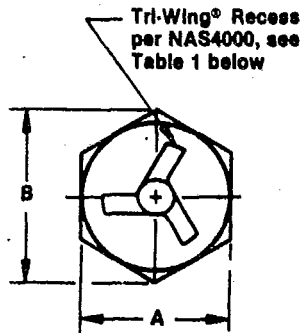


NATIONAL AEROSPACE STANDARD

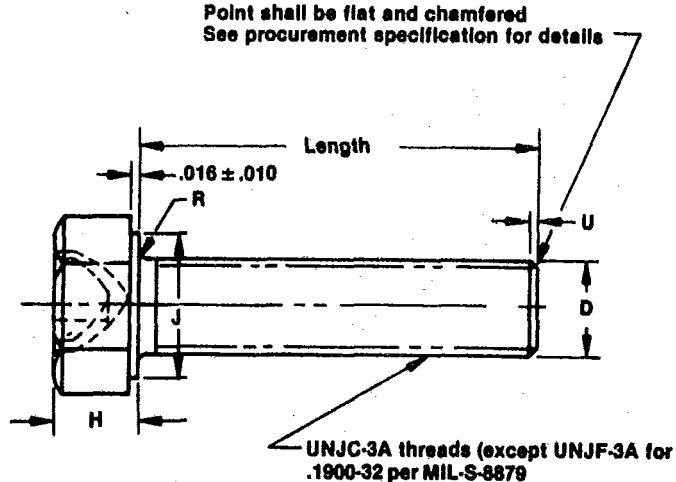
AEROSPACE INDUSTRIES ASSOCIATION OF AMERICA, INC., 1725 DE SALES STREET, N.W., WASHINGTON, D. C. 20036

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FED. SUP CLASS



Tri-Wing® Recess
per NAS4000, see
Table 1 below



Diameter of unthreaded portion of shank
shall not be less than min pitch dia nor
more than max major dia of thread.

Head marking shall be depressed (.010 max) and arranged
as follows:

First Sector - Mark .1120-40 size with "4",
.1380-32 size with "8", .1640-32 size with "8" and
.1900-32 size with "10".

Second Sector - Mark with length dash number
plus manufacturer's symbol.

Third Sector - Mark with recess dash number, en-
circled. Recess number should be approximately 25%
larger than other numerals in head marking.

THREAD LENGTH: Screws less than 2 dia in length -
complete threads shall extend to within 2 pitches of
bearing surface of head and incomplete threads may
extend up to bearing surface. Screws 2 dia thru 2" in
length - complete threads shall extend to within 2 pitches
of tangency of "R" and incomplete threads may extend
up to "R" fillet area. Screws longer than 2" - complete
threads shall extend 1.75 min from end of screw and
incomplete threads may extend up to "R" fillet area.
INCOMPLETE THREADS: See NAS4003.

TABLE 1 DIMENSIONS

Basic Number ..	Nom Thread	A Hex		B Min	D Dia Max	H		J Dia Min (a)(b)	R Rad		U Max	Tri-Wing® Recess Number
		Max	Min			Max	Min		Max	Min		
NAS5900	.1120-40	.189	.181	.207	.112	.060	.049	.158	.010	.005	.031	NAS4000-2
NAS5901	.1380-32	.251	.243	.268	.138	.093	.080	.215	.010	.005	.039	NAS4000-3
NAS5902	.1640-32	.251	.243	.268	.164	.110	.098	.215	.020	.010	.039	NAS4000-4
NAS5903	.1900-32	.313	.305	.339	.190	.120	.105	.275	.020	.010	.039	NAS4000-5
NAS5903J	.1900-32	.313	.305	.339	.190	.120	.105	.275	.020	.010	.039	NAS4000-4J

**The last digit of the basic number designates the size.

⑤ **INACTIVE FOR NEW DESIGN
AFTER JANUARY 1, 1986
NO SUPERSEDING STANDARD**

⑤ **LIST OF CURRENT SHEETS**

NO.	REV.
1	5
2	4

(a) & (b) etc: See notes on Sheet 2.

TRI-WING® IS A REGISTERED TRADEMARK OF THE PHILLIPS SCREW COMPANY.

CUSTODIAN NATIONAL AEROSPACE STANDARDS COMMITTEE		THIRD ANGLE PROJECTION
PROCUREMENT SPECIFICATION	TITLE SCREW, HEX HEAD, TRI-WING® RECESS, ALLOY STEEL, FULL THREAD NONLOCKING	CLASSIFICATION STANDARD PART
		NAS Documents SH 1 OF 2

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Full document details: AIA NAS5900-5903 1985

THIS DRAWING SUPERSEDES ALL ANTECEDENT STANDARD DRAWINGS FOR THE
SAME PRODUCT AND SHALL BECOME EFFECTIVE NO LATER THAN SIX MONTHS
FROM THE LAST DATE OF APPROVAL SHOWN HEREON.

AIA/NAS NAS*5900 THRU*5903 &5 0318743 0003594 4

APPROVAL DATE Dec. 1988 REVISION ① 16 March 1970 ② 30 June 1972 ③ 15 June 1973 ④ 17 Dec. 1979 ⑤ 15 August 1985

TABLE II PREFERRED LENGTHS

Dash Numbers	3	4	5	6	7	8	9	10	11	12	13	14
Length	.19	.25	.31	.38	.44	.50	.56	.62	.68	.75	.81	.88
Length Tol	+.00, -.03											

Dash Numbers	15	16	18	20	22	24	26	28	30	32	34 to 86
Length	.94	1.00	1.12	1.25	1.38	1.50	1.62	1.75	1.88	2.00	2.12 to 6.00
Length Tol	+.00, -.03		+.00, -.06								+.00, -.08

Dash number indicates length in .0625 increments (rounded to two decimal places). Use of .25 inch increments is recommended for screws over 3 inches long. Intermediate or longer lengths may be specified by use of whole dash number only.

MATERIAL: Alloy Steel - 4340 per MIL-S-5000 or 8740 per MIL-S-6049 or AMS6322.

HEAT TREAT: 160 to 180 KSI ultimate tensile.

FINISH: Cadmium plate per QQ-P-416, Type II, Class 2. Embrittlement requirements per NAS4002. Parts with Class 3 plating may be furnished from supplier's stock until 15 June 1975.

CODE: Basic part number indicates plated, nonlocking screw. See Table I.
Dash number indicates length. See Table II.
Add "J" as the fifth digit in basic four-digit part for the deep number 4 recess.

EXAMPLE OF PART NUMBER:

NAS5903-10 = Screw, .1900-32 thread, .62 long.
NAS5903J 10 = Screw, .1900-32 thread, .62 long, 4J recess.

NOTES:

- (a) Concentricity: "J" dia to thread pitch dia within .005 TIR.
- (b) Max J dia shall not exceed actual "A" dimension.

SURFACE TEXTURE:

(AA max per ANSI B46.1) head to shank fillet, thread flanks and thread root 32; bearing surface of head 63; other surfaces 125.

DIMENSIONS TO BE MET AFTER PLATING.

DIMENSIONS IN INCHES.

PROCUREMENT SPECIFICATION:

NAS4002, except as noted. Cold working of head to shank fillet is not required for NAS5900 thru 5903 screws.

④ **INACTIVE FOR NEW DESIGN**
AFTER JANUARY 1, 1986
NO SUPERSEDING STANDARD



THIS DRAWING SUPERSEDES ALL ANTECEDENT STANDARD DRAWINGS FOR THE SAME PRODUCT AND SHALL BECOME EFFECTIVE NO LATER THAN SIX MONTHS FROM THE LAST DATE OF APPROVAL SHOWN HEREON.

AIA/NAS NAS*5900 THRU*5903 85 0318743 0003595 6

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