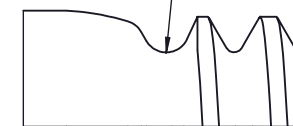


SEE COLLAR STANDARDS  
 FOR COLLAR STRENGTHS.  
 LOWER STRENGTH (PIN OR  
 COLLAR) DETERMINES  
 SYSTEM STRENGTH.

FIRST DASH NO.	PIN NOM DIA	A DIA	B REF	D DIA		TD DIA	F REF	H	R RAD	Z MAX	S CHAMFER REF	THREAD MODIFIED	SOCKET			DOUBLE SHEAR POUNDS MINIMUM	TENSION POUNDS MINIMUM
				WITHOUT COATING OR SOLID FILM	WITH COATING OR SOLID FILM								W HEX	T DEPTH	Y DIA		
5				NOTE: USE HST59( )6-( )													
6	13/64	.3813 .3765	.300	.2026 .2021	.2026 .2016	.1840 .1810	.005	.0750 .0730	.030 .020	.015	1/32 x 45°	.1900-32 UNJF-3A	.0806 .0791	.100 .080	.119 .104	8,100	4,350
8	17/64	.5066 .5018	.330	.2651 .2646	.2651 .2641	.2440 .2410	.006	.1013 .0993	.030 .020	.015	1/32 x 45°	.2500-28 UNJF-3A	.0967 .0947	.110 .090	.142 .122	13,800	7,750
10	21/64	.6335 .6287	.390	.3276 .3271	.3276 .3266	.3060 .3020	.007	.1283 .1263	.040 .030	.015	3/64 x 45°	.3125-24 UNJF-3A	.1295 .1270	.130 .110	.180 .160	21,100	12,300
12	25/64	.7604 .7556	.430	.3901 .3896	.3901 .3891	.3680 .3640	.008	.1553 .1533	.040 .030	.015	3/64 x 45°	.3750-24 UNJF-3A	.1617 .1582	.160 .140	.217 .197	30,000	19,100
14	29/64	.8884 .8812	.510	.4526 .4521	.4526 .4516	.4310 .4260	.009	.1828 .1798	.050 .040	.022	3/64 x 45°	.4375-20 UNJF-3A	.1930 .1895	.190 .170	.253 .233	40,300	25,800
16	33/64	1.0139 1.0068	.610	.5151 .5146	.5151 .5141	.4930 .4880	.010	.2093 .2063	.050 .040	.022	3/64 x 45°	.5000-20 UNJF-3A	.2242 .2207	.220 .200	.289 .269	52,500	34,300

THIS AREA OF SPECIAL CONFIGURATION  
 AND COLD WORKING TO MEET PHYSICAL  
 REQUIREMENTS



HI-LITE™ THREAD TRANSITION AREA  
 SEE SPECIFICATION FOR INSPECTION

"HI-LITE", "HST", AND "HI-KOTE",  
 ARE TRADEMARKS OF HI-SHEAR CORPORATION

DRAWN BY J.F.OBISPO	DATE 1996-10-17	TITLE <b>HI-LITE™ PIN</b> 100° FLUSH MS24694 TENSION HEAD NICKEL BASE ALLOY (INCONEL 718) 1/16 GRIP VARIATION, 1/64 OVERSIZE
APPROVED MC	DATE 1996-10-21	
REVISION 6	DATE A.CHAE 2022-09-29	DRAWING NUMBER <b>HST159</b>

- GENERAL NOTES:**
- 1 Head edge out of roundness shall not exceed "F".
  2. Concentricity: Conical surface of head to "D" diameter within .005 FIM.
  3. "H" is dimensioned from maximum "D" diameter.
  4. Dimensions are in inches and to be met after finish.
  5. Surface texture per ASME B46.1.
  6. Hole preparation per NAS618.
  - 7 Curved or flat edge manufacturer's option.
  - 8 Broach petals removed.
- ⑥ 9 After February, 21st of 2015, HI-KOTE™ 1 aluminum pigmented coating per Hi-Shear Spec. 294 will be replaced by REACH compliant HI-KOTE™ 1 NC aluminum pigmented coating per Hi-Shear Spec. 294 on fasteners coated in the UK and European Union.

**MATERIAL:** Nickel base alloy per AMS5662.

**HEAT TREAT:** 125,000 psi shear minimum.

- ⑥ **FINISH:** HST159-( )-( ) = Passivate per AMS2700, Method 1, Type 8, Class 1, and cetyl alcohol lube per Hi-Shear Spec. 305.
- ⑥ 9 HST159AC( )-( ) = HI-KOTE™ 1 or HI-KOTE™ 1 NC aluminum coating per Hi-Shear Spec. 294 with color code green on thread end, and cetyl alcohol lube per Hi-Shear Spec. 305.
- ⑥ 9 HST159AG( )-( ) = HI-KOTE™ 1 or HI-KOTE™ 1 NC aluminum coating per Hi-Shear Spec. 294 with color code orange on thread end, and cetyl alcohol lube per Hi-Shear Spec. 305.
- ⑥ 9 HST159AP( )-( ) = HI-KOTE™ 1 or HI-KOTE™ 1 NC aluminum coating per Hi-Shear Spec. 294, and cetyl alcohol lube per Hi-Shear Spec. 305.
- HST159DU( )-( ) = Solid film lube per AS5272, Type I.
- ⑥ 9 HST159GD( )-( ) = HI-KOTE™ 1 or HI-KOTE™ 1 NC aluminum pigmented coating on threads only per Hi-Shear Spec. 294, and cetyl alcohol lube per Hi-Shear Spec. 305.
- ⑥ 9 HST159GM( )-( ) = HI-KOTE™ 1 or HI-KOTE™ 1 NC aluminum pigmented coating per Hi-Shear Spec. 294 on threads (no overspray on the shank is allowed) and top of head only (.005 max overspray on the head bearing surface permissible) with color white on thread end, and cetyl alcohol lube per Hi-Shear Spec. 305.
- 8 HST159MA( )-( ) = Solid film lube per Kalgard RA.
- HST159TB( )-( ) = HI-KOTE™ 2 solid film lube per Hi-Shear Spec. 292, and cetyl alcohol lube per Hi-Shear Spec. 305.
- HST159TP( )-( ) = HI-KOTE™ 2 solid film lube per Hi-Shear Spec. 292 with color code orange on thread end, and cetyl alcohol lube per Hi-Shear Spec. 305.
- HST159HK( )-( ) = HI-KOTE™ 4 NC aluminum coating per Hi-Shear Spec. 397.
- ⑥ HST159NAP( )-( ) = HI-KOTE™ 1 NC aluminum coating per Hi-Shear Spec. 294, and cetyl alcohol lube per Hi-Shear Spec. 305.

**SPECIFICATION:** HI-LITE™ Product Specification 380.

**CODE:** First dash number indicates nominal diameter in 1/32nds of the pin which HST159 oversize pin replaces.  
 Second dash number indicates maximum grip in 1/16ths. See Finish note for explanation of code letters.

**HOW TO ORDER**

**EXAMPLE:**

Pin Part Number  
 HST159AP8-8

