

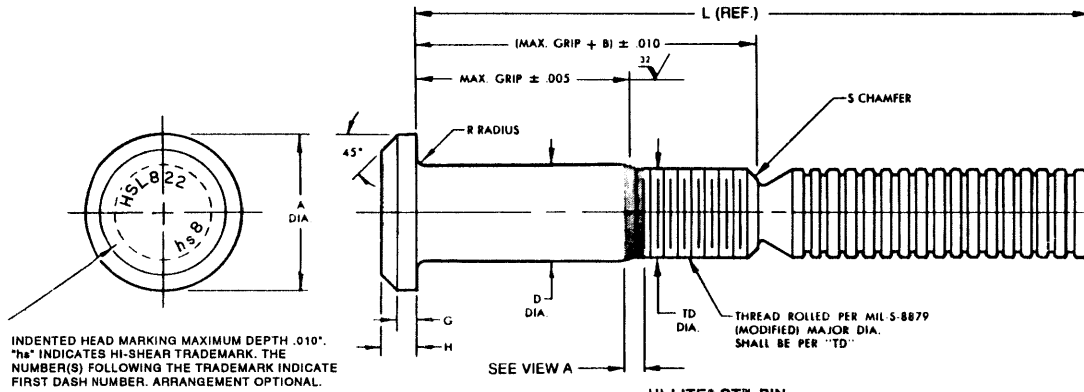
hi-shear
CORPORATION

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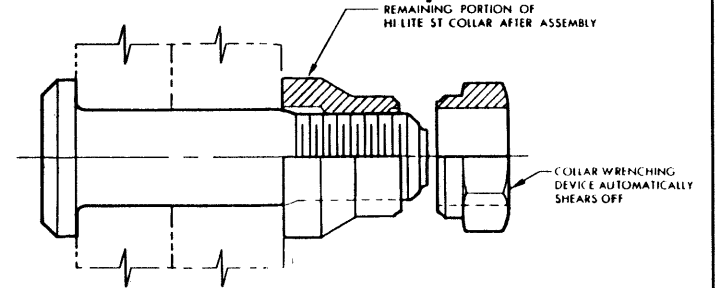
CAGE = Commercial And Government Entity

HI-SHEAR CORPORATION, U.S.A. (Patent Holder) CAGE No. 73197
Division of Hi-Shear Industries, Inc., U.S.A.
AIR INDUSTRIES CO., INC. (Licensee - U.S. & Canada) CAGE No. 08725
SPS TECHNOLOGIES, U.S.A. (Licensee) CAGE No. 58878
HI-SHEAR FASTENERS EUROPE LTD, U.K. (Licensee) CAGE No. 0L888
Division of Hi-Shear Industries, Inc., U.S.A.

HUCK INTERNATIONAL GmbH & Co. Germany (Licensee - EEC Countries)
SIMMONDS S.A. France (Licensee - EEC Countries - Collars)
SL-CHAMOND GRANAT S.A. France (Licensee - EEC Countries)
TOKYO SCREW COMPANY, Japan (Licensee - Japan)
941103



HI-LITE® ST™ PIN

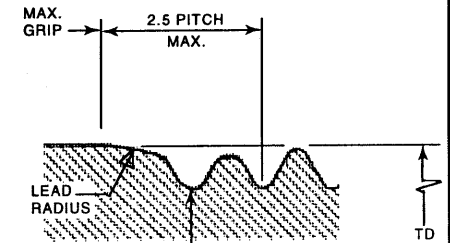


HI-LITE® ST™ PIN AND COLLAR AFTER ASSEMBLY

INDENTED HEAD MARKING MAXIMUM DEPTH .010".
"h" INDICATES HI-SHEAR TRADEMARK. THE
NUMBER(S) FOLLOWING THE TRADEMARK INDICATE
FIRST DASH NUMBER. ARRANGEMENT OPTIONAL.

FIRST DASH NO.	NOM. DIA.	A DIA.	B REF.	D DIA.	TD DIA.	G REF.	H	R RAD.	S CHAMFER REF.	THREAD	DOUBLE SHEAR POUNDS MINIMUM	TENSION POUNDS MINIMUM
5	5/32	.322 .306	.312	.1635 .1625	.1595 .1570	.030	.065 .055	.025 .015	1/32" x 45°	8-32UNJC-3A Modified	5,280	2,940
6	3/16	.377 .357	.325	.1895 .1885	.1840 .1810	.035	.074 .064	.025 .015	1/32" x 45°	10-32UNJF-3A Modified	7,060	4,350
8	1/4	.440 .415	.395	.2495 .2485	.2440 .2410	.045	.090 .080	.025 .015	1/32" x 45°	1/4-28UNJF-3A Modified	12,260	7,750
10	5/16	.505 .472	.500	.3120 .3110	.3060 .3020	.055	.112 .102	.030 .020	3/64" x 45°	5/16-24UNJF-3A Modified	19,160	12,300
12	3/8	.600 .530	.545	.3745 .3735	.3680 .3640	.075	.140 .130	.030 .020	3/64" x 45°	3/8-24UNJF-3A Modified	27,600	19,100
14	7/16	.676 .592	.635	.4370 .4360	.4310 .4260	.095	.160 .150	.030 .020	3/64" x 45°	7/16-20UNJF-3A Modified	37,500	25,800
16	1/2	.770 .717	.685	.4995 .4985	.4930 .4880	.095	.188 .178	.030 .020	3/64" x 45°	1/2-20UNJF-3A Modified	49,100	34,300

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



VIEW A
HI-LITE THREAD TRANSITION AREA. THIS AREA OF SPECIAL CONFIGURATION AND COLD WORKING TO MEET PHYSICAL REQUIREMENTS. SEE SPECIFICATION FOR INSPECTION.

GENERAL NOTES:

1. Concentricity: "A" to "D" diameter within .010 FIR.
2. Dimensions to be met after finish.
3. Surface texture per ANSI B46.1.
4. Hole preparation per NAS618.
5. Lead radius must be tangent to "D" diameter at max grip.
6. Use HSL832 for oversize replacement.
7. Shorter or longer grips than those listed may be available as specials.

CODE:

First dash number indicates nominal diameter in 1/32nds.
Second dash number indicates maximum grip in 1/16ths.
See "Finish" note for explanation of code letters.

HOW TO ORDER EXAMPLES:

Pin Part Number Only
HSL822DL-8-8
└─ 8/16 or 1/2 Maximum Grip Length
└─ 8/32 or 1/4 Nominal Diameter Pin
└─ Finish
└─ Pin Part Number

MATERIAL: Nickel Base Alloy per AMS5662.

HEAT TREAT: 125,000 psi shear minimum.

FINISH: HSL822DL-(-) = Kalgard FA or EM620C solid film lube per MIL-L-46010, Type I and cetyl alcohol lube per Hi-Shear Spec. 305.
HSL822AP-(-) = Hi-Kote 1 aluminum coating per Hi-Shear Spec. 294, and cetyl alcohol lube per Hi-Shear Spec. 305.
HSL822TB-(-) = Hi-Kote 2 solid film lube per Hi-Shear Spec. 292, and cetyl alcohol lube per Hi-Shear Spec. 305.

SPECIFICATION: Hi-Lite Product Specification 380-2.

U.S. Patents 4,326,825; 4,485,510 and 4,957,401.
Other U.S. and foreign patents pending.
"Hi-Lite" is a registered trademark and "Hi-Lite ST" is a trademark of Hi-Shear Corporation.

DRAWN DATE		TITLE	
J.F.Obispo	8-8-95	HI-LITE® ST™ PIN PROTRUDING TENSION HEAD BREAK STEM, INTERFERENCE FIT NICKEL BASE ALLOY (INCONEL 718) 1/16" GRIP VARIATION	
APPROVED DATE		DRAWING NUMBER	
J.Rausch	8-9-95	HSL822 Sheet 1 of 2	
REVISION DATE			
①	J.F.Obispo 10-16-96		

HSL822

STD/HSL

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St.-CHAMOND GRANAT S.A. France..... (Licensee - EEC Countries)
TOKYO SCREW COMPANY, Japan..... (Licensee - Japan)

941103

TABLE 1

SECOND DASH NO.	L REF. 7						
	-5	-6	-8	-10	-12	-14	-16
1	-	-	-	-	-	-	-
2	.875	1.000	1.000	-	-	-	-
3	1.000	1.125	1.125	1.250	-	-	-
4	1.125	1.250	1.250	1.375	1.375	-	-
5	1.250	1.375	1.375	1.500	1.500	1.625	-
6	1.375	1.500	1.500	1.625	1.625	1.750	1.750
7	1.500	1.625	1.625	1.750	1.750	1.875	1.875
8	1.625	1.750	1.750	1.875	1.875	2.000	2.000
9	1.750	1.875	1.875	2.000	2.000	2.125	2.125
10	1.875	2.000	2.000	2.125	2.125	2.250	2.250
11	2.000	2.125	2.125	2.250	2.250	2.375	2.375
12	2.125	2.250	2.250	2.375	2.375	2.500	2.500
13	2.250	2.375	2.375	2.500	2.500	2.625	2.625
14	2.375	2.500	2.500	2.625	2.625	2.750	2.750
15	2.500	2.625	2.625	2.750	2.750	2.875	2.875
16	2.625	2.750	2.750	2.875	2.875	3.000	3.000
17	2.750	2.875	2.875	3.000	3.000	3.125	3.125
18	2.875	3.000	3.000	3.125	3.125	3.250	3.250
19	3.000	3.125	3.125	3.250	3.250	3.375	3.375
20	3.125	3.250	3.250	3.375	3.375	3.500	3.500
21	-	3.375	3.375	3.500	3.500	3.625	3.625
22	-	3.500	3.500	3.625	3.625	3.750	3.750
23	-	3.625	3.625	3.750	3.750	3.875	3.875
24	-	3.750	3.750	3.875	3.875	4.000	4.000
25	-	-	-	4.000	4.000	4.125	4.125
26	-	-	-	4.125	4.125	4.250	4.250
27	-	-	-	4.250	4.250	4.375	4.375
28	-	-	-	4.375	4.375	4.500	4.500
29	-	-	-	-	4.500	4.625	4.625
30	-	-	-	-	4.625	4.750	4.750
31	-	-	-	-	4.750	4.875	4.875
32	-	-	-	-	4.875	5.000	5.000
33	-	-	-	-	5.000	5.125	5.125
34	-	-	-	-	5.125	5.250	5.250
35	-	-	-	-	5.250	5.375	5.375
36	-	-	-	-	5.375	5.500	5.500
37	-	-	-	-	5.500	5.625	5.625
38	-	-	-	-	5.625	5.750	5.750
39	-	-	-	-	5.750	5.875	5.875
40	-	-	-	-	5.875	6.000	6.000
41	-	-	-	-	6.000	6.125	6.125
42	-	-	-	-	6.125	6.250	6.250
43	-	-	-	-	6.250	6.375	6.375
44	-	-	-	-	6.375	6.500	6.500

DRAWING NUMBER

HSL822