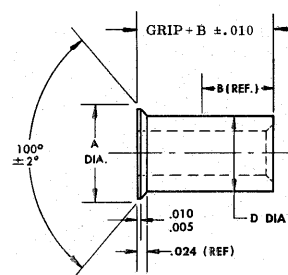
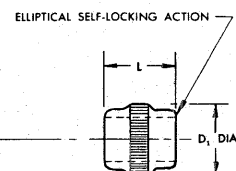


hi-shear
CORPORATION

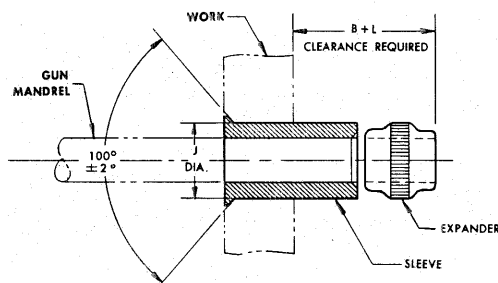
2600 Skypark Drive
Torrance, California 90509 U.S.A.
Telephone (310) 326-8110
FAX (310) 784-4144



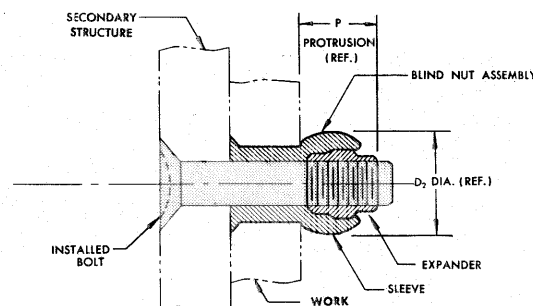
SLEEVE



EXPANDER



SLEEVE AND EXPANDER ASSEMBLED ON MANDREL, INSERTED INTO WORK, READY TO SET



COMPLETED BLIND NUT ASSEMBLY SHOWING SECONDARY STRUCTURE AND INSTALLED BOLT

BN525 BLIND NUT ASSEMBLY		BN330 SLEEVE						BB415 EXPANDER				HOLE PREPARATION		PROTRUSION AFTER INSTALLATION	
FIRST DASH NO.		FIRST DASH NO.	A DIA.	B GRIP RANGE 0-3/4	B GRIP RANGE 13/16 - 1-1/16	B GRIP RANGE 1-1/8 - 1-5/8	D DIA.	PART NUMBER	D1 DIA.	L	THREAD	J HOLE DIA.		D2 DIA.	P
-440		-440	.229 .224	.210	----	----	.169 .167	BB415-5	.167	.153	4-40UNJC-3B	.173 .170		.210	.175
-632		-632	.278 .273	.280	----	----	.218 .216	BB415-632	.217	.215	6-32UNJC-3B	.222 .219		.285	.260
-832		-832	.317 .312	.315	.330	----	.257 .255	BB415-8	.255	.245	8-32UNJC-3B	.264 .258		.335	.290
-1024		-1032	.372 .367	.380	.420	.460	.312 .309	BB415-1024 BB415-1032	.309	.307	10-24UNJC-3B 10-32UNJF-3B	.319 .313		.410	.350
-420		-428	.450 .445	.450	.450	.450	.390 .387	BB415-420 BB415-12	.383	.368	1/4-20UNJC-3B 1/4-28UNJF-3B	.397 .391		.510	.420
-518		-524	.528 .523	.500	.500	.500	.468 .465	BB415-518 BB415-14	.458	.429	5/16-18UNJC-3B 5/16-24UNJF-3B	.477 .469		.600	.470
-616		-624	.590 .585	.550	.550	.550	.530 .527	BB415-616 BB415-16	.521	.491	3/8-16UNJC-3B 3/8-24UNJF-3B	.539 .531		.662	.530

BN330 SLEEVE

NOTE: 1. Concentricity: Hole to "D" diameter within .005 FIM.
"D" diameter to head within .005 FIM.

MATERIAL: Type 305 stainless steel per QQ-S-763.

HEAT TREAT: Anneal.

FINISH: Sandblast.

CODE: First dash number indicates size of bolt to be used.
Second dash number indicates grip length (thickness of work) in 16ths.

EXAMPLE: BN330-428-12 = Sleeve for 1/4-28 bolt or 1/4-20 bolt, 3/4" grip length.

BB415 EXPANDER

NOTES: 1. Threads per MIL-S-8879.

MATERIAL: A-286 alloy per AMS5731.

HEAT TREAT: 110,000 psi shear minimum.

⑤ **FINISH:** BB415-() = Solid film lube per MIL-L-46010 Type I.
BB415GA() = Silver plate per AMS2411.
BB415MA() = Solid film lube per Kalgard RA.

CODE: Dash number indicates expander used in assembly.

EXAMPLES: BB415-12 = Expander for 1/4-28 bolt.
BB415GA12 = Expander for 1/4-28 bolt, silver plated per AMS2411
⑤ BB415MA12 = Expander for 1/4-28 bolt, solid film lube per Kalgard RA.

BN525 BLIND NUT ASSEMBLY

CODE: First dash number indicates size of bolt to be used.
Second dash number indicates grip length (thickness of work) in 16ths.

EXAMPLE: BN525-428-12

3/4 Grip Length
For 1/4-28 Bolt
Blind Nut Assembly which includes
BN330 Sleeve and BB415 Expander
BN525GA428-12 = As above except with Expander BB415GA.

"BLIND NUT" is a trademark of Hi-Shear Corporation

DRAWN		DATE		TITLE	
Rome		8-13-65		BLIND NUT ASSEMBLY	
APPROVED		DATE		DRAWING NUMBER	
R.W.T.		8-13-65		BN525	
REVISION		DATE			
⑤		J.R.H. 4-01-97			

BN525