FEDERAL SUPPLY CLASS
5935

THE REQUIREMENTS FOR ACQUIRING THE ACCESSORIES DESCRIBED HEREIN SHALL CONSIST OF THIS SPECIFICATION AND THE LATEST ISSUE OF SAE AS85049.

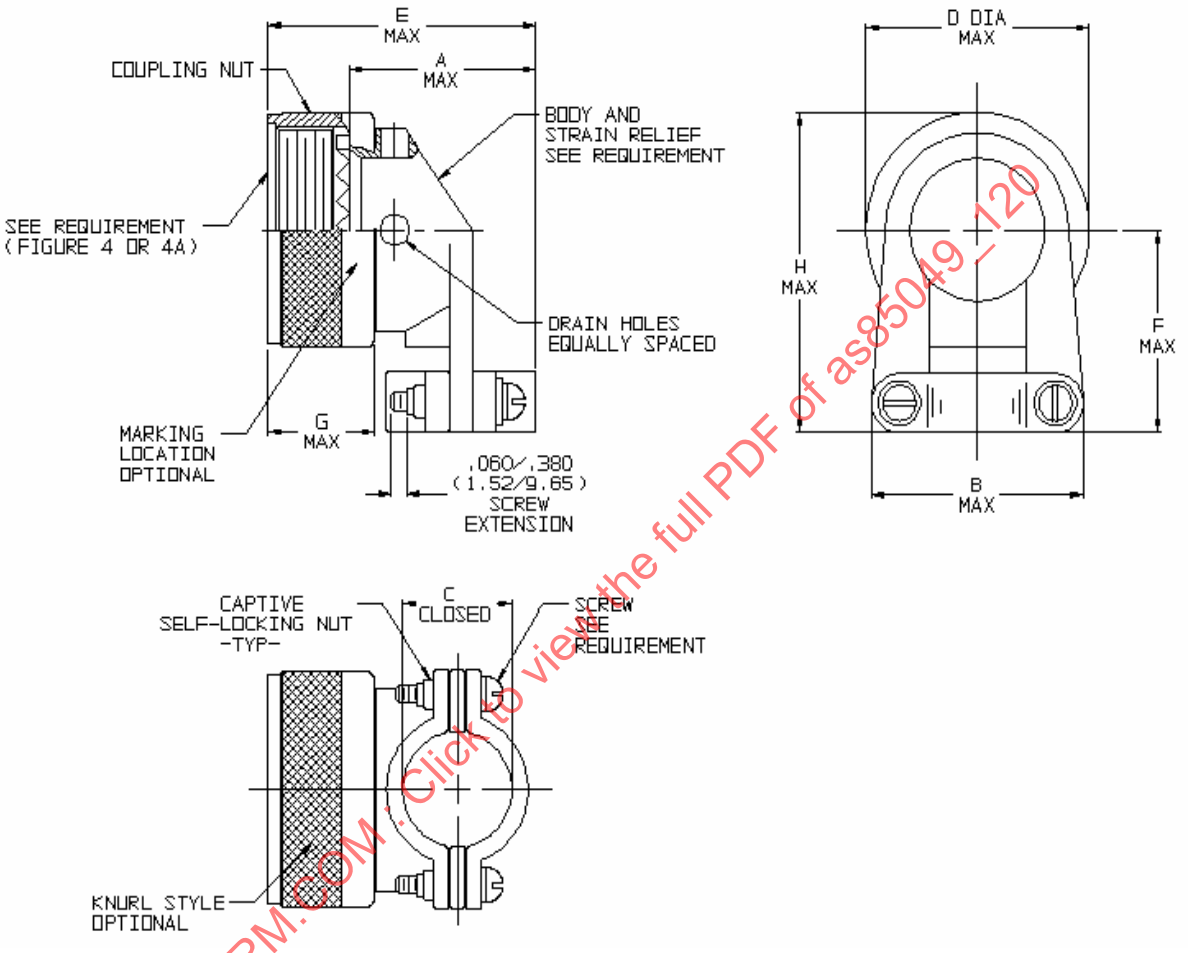

FIGURE 1 - DIMENSION AND CONFIGURATION

ISSUED 2005-04

THIRD ANGLE PROJECTION

SAE 100
Leading Our World In Motion

CUSTODIAN: SAE AE-8/AE-8C1

SAE Aerospace
An SAE International Group

AEROSPACE STANDARD

CONNECTOR ACCESSORIES, ELECTRICAL, STRAIN RELIEF, 90° SELF-LOCKING, CATEGORY 4B (FOR MIL-DTL-5015 CRIMP, MIL-DTL-26482 SERIES 2, AS81703 SERIES 3, AND MIL-DTL-83723 SERIES III CONNECTORS)

AS85049/120
SHEET 1 OF 4

TO PLACE A DOCUMENT ORDER: **Tel: 877-606-7323 (inside USA and Canada)** **Tel: 724-776-4970 (outside USA)**
Fax: 724-776-0790 **Email: custsvc@sae.org** **SAE WEB ADDRESS: http://www.sae.org**

SHELL SIZES AND DIMENSIONS

DASH NO.	CONNECTOR SHELL SIZE: MIL-DTL-83723 SERIES 3	MIL-DTL-5015 CRIMP	AS81703 SERIES 3	MIL-DTL-26482 SERIES 2	A MAX LENGTH 2/	B DIM MAX	C ±.031 DIM 1/	D MAX DIA	E MAX OVERALL LENGTH	F MAX	G MAX	H MAX	SCREW SIZE (REF)
-03	--	--	3	--	.93 (23.6)	.88 (22.4)	.219 (5.6)	.95 (24.1)	1.29 (32.8)	.84 (21.3)	.710 (18.03)	1.32 (33.5)	6-32
-08	8	8S	--	8	.93 (23.6)	.88 (22.4)	.219 (5.6)	.89 (22.6)	1.29 (32.8)	.81 (20.6)	.710 (18.03)	1.26 (32.0)	6-32
-10	10	10S,10SL	--	10	1.02 (25.9)	.94 (23.9)	.264 (6.7)	1.01 (25.7)	1.38 (35.1)	.87 (22.1)	.710 (18.03)	1.38 (35.1)	6-32
-12	12	12,12S	7	12	1.21 (30.7)	1.12 (28.4)	.344 (8.7)	1.14 (29.0)	1.57 (39.9)	.93 (23.6)	.710 (18.03)	1.50 (38.1)	6-32
-14	14	14,14S	12	14	1.27 (32.3)	1.19 (30.2)	.460 (11.7)	1.26 (32.0)	1.63 (41.4)	1.00 (25.4)	.710 (18.03)	1.63 (41.4)	6-32
-16	16	16,16S	19	16	1.42 (36.1)	1.44 (36.6)	.545 (13.8)	1.39 (35.3)	1.78 (45.2)	1.06 (26.9)	.710 (18.03)	1.75 (44.5)	6-32
-18	18	18	27	18	1.53 (38.9)	1.56 (39.6)	.615 (15.7)	1.51 (38.4)	1.89 (48.0)	1.23 (31.2)	.710 (18.03)	1.99 (50.6)	8-32
-20	20	20	37	20	1.65 (41.9)	1.69 (42.9)	.698 (17.7)	1.64 (41.7)	2.01 (51.1)	1.30 (33.0)	.710 (18.03)	2.07 (52.6)	8-32
-22	22	22	--	22	1.78 (45.2)	1.75 (44.5)	.780 (19.8)	1.76 (44.7)	2.14 (54.4)	1.36 (34.5)	.710 (18.03)	2.25 (57.2)	8-32
-24	24	24	--	24	1.90 (48.3)	1.88 (47.8)	.850 (21.6)	1.89 (48.0)	2.26 (57.4)	1.42 (36.1)	.710 (18.03)	2.37 (60.2)	8-32
-28	--	28	--	--	2.20 (55.9)	2.12 (53.8)	.950 (24.1)	2.14 (54.4)	2.72 (69.1)	1.63 (41.4)	.890 (22.6)	2.70 (68.6)	8-32
-32	--	32	--	--	2.27 (57.7)	2.50 (63.5)	1.015 (25.3)	2.40 (61.0)	2.79 (70.9)	1.86 (47.2)	.890 (22.6)	3.05 (77.5)	¼-20
-36	--	36	--	--	2.39 (60.7)	2.62 (66.5)	1.187 (30.1)	2.64 (67.1)	2.91 (73.9)	1.98 (50.3)	.890 (22.6)	3.30 (83.8)	¼-20
-40	--	40	--	--	2.52 (64.0)	2.68 (68.1)	1.220 (31.0)	2.89 (73.4)	3.04 (77.2)	2.10 (53.3)	.890 (22.6)	3.55 (90.2)	¼-20
-44	--	44	--	--	2.77 (70.4)	3.00 (76.2)	1.500 (37.3)	3.14 (79.8)	3.29 (83.6)	2.36 (59.9)	.890 (22.6)	3.93 (99.8)	¼-20
-48	--	48	--	--	2.89 (73.4)	3.50 (88.9)	1.625 (41.3)	3.39 (86.1)	3.41 (86.6)	2.48 (63.0)	.890 (22.6)	4.18 (106.7)	¼-20
-51	--	--	61	--	1.90 (48.3)	1.88 (47.8)	.850 (21.6)	1.95 (49.5)	2.26 (57.4)	1.45 (36.8)	.710 (18.03)	2.43 (61.7)	8-32

1/ CABLE ENTRY IS MEASURED WITH SADDLE BARS CLOSED AND BOTTOMED ON CLAMP BARS.
2/ THE "A" DIMENSION IS MEASURED FROM THE BOTTOM OF THE ACCESSORY TEETH TO THE END OF THE STRAIN RELIEF.

NOTES:

1. DIMENSIONS ARE IN INCHES.
2. DIMENSIONS APPLY AFTER PLATING.
3. METRIC EQUIVALENTS ARE GIVEN FOR GENERAL INFORMATION ONLY AND ARE BASED ON 25.4 MM = 1 INCH.
4. MILLIMETERS ARE IN PARENTHESES.
5. THE STRAIN RELIEF SHALL ACCOMMODATE SAE AS85049/127 BUSHING STRIP.

FIGURE 1 - DIMENSIONS AND CONFIGURATIONS (CONTINUED)

REQUIREMENTS:

DESIGN AND CONSTRUCTION:

1. DIMENSIONS AND CONFIGURATION: SEE FIGURE 1.

2. INTERFACE DIMENSIONS SHALL CONFORM TO SAE AS85049, FIGURE 4 OR 4A

3. ACCESSORIES CONSIST OF A COUPLING NUT, BODY AND STRAIN RELIEF THE COUPLING NUT SHALL BE CAPTIVATED TO, AND ROTATABLE ON THE BODY.

4. DETENTED SELF-LOCKING PROVIDES A POSITIVE AUDIBLE DETENTED COUPLING.

5. CLAMPS SHALL HAVE NO PROTRUSIONS OR SHARP EDGES WHICH MAY PINCH CABLE.

6. MATERIAL AND FINISH: SEE TABLE 1. ACCESSORIES SHALL BE AS SHOWN IN TABLE 1.

7. LOCKNUTS AND SCREWS: 300 SERIES CORROSION-RESISTANT STEEL, PASSIVATE. SILVER PLATE OPTIONAL.

8. SELF-LOCKING DEVICE: CORROSION RESISTANT MATERIAL.

TABLE 1 - MATERIAL AND FINISH

FIGURE	MATERIAL	FINISH
1	ALUMINUM ALLOY IN ACCORDANCE WITH SAE AS85049	A N 1/ W 2/
	CORROSION RESISTANT STEEL 300 SERIES IN ACCORDANCE WITH SAE AMS 763	S

1/ NOT FOR NAVY USE. AIR FORCE USE IS FOR SPACE APPLICATIONS ONLY. W IS THE PREFERRED FINISH.
2/ W IS NOT FOR USE IN SPACE APPLICATION.

SELF-LOCKING DEVICES DESIGN AND CONSTRUCTION:

1. COUPLINGS WITH SELF-LOCKING DEVICES SHALL MEET ALL THE REQUIREMENTS SPECIFIED HEREIN FOR ITS SPECIFIC CATEGORY AND THE FOLLOWING ADDITIONAL TEST:

   a LIFE CYCLE: SEE AS85049 PARA 4.6.15

   b. VIBRATION: SEE AS85049 PARA 3.5.4.1