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REV.
B

AS27197

FEDERAL SUPPLY CLASS
5330

RATIONALE

THE PURPOSE OF THIS REVISION IS TO COMPLETELY UPDATE THE FIGURES, FORMAT AND REQUIREMENTS TO ALIGN WITH CURRENT STANDARDS AND TO REMOVE REFERENCES TO OBSOLETE DOCUMENTS.

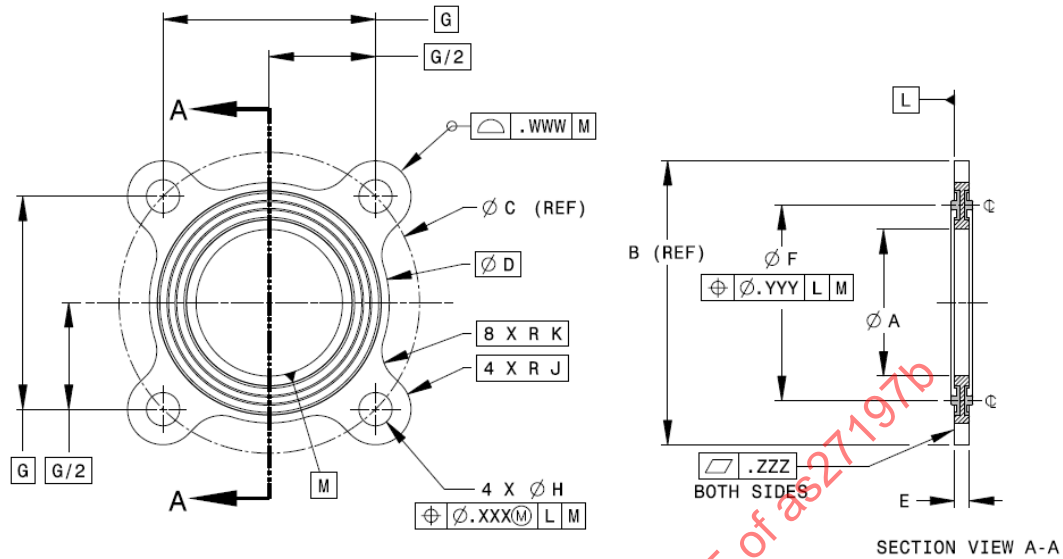


FIGURE 1 - SEAL -12 THRU -32

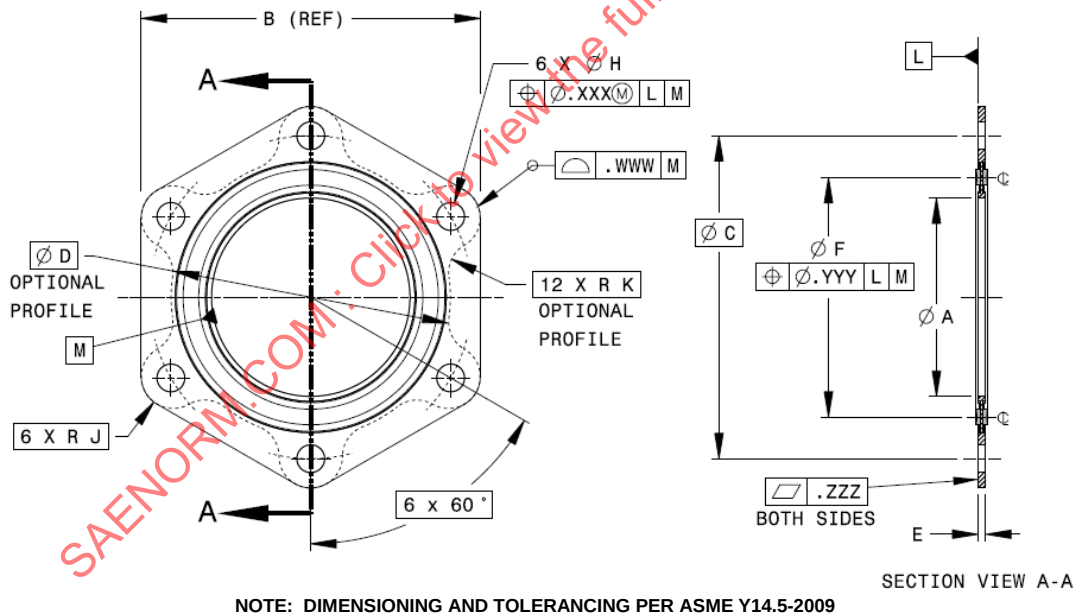
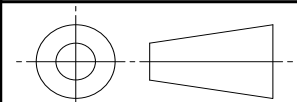


FIGURE 2 - SEAL -40 THRU -48

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THIRD ANGLE PROJECTION



CUSTODIAN: A-6/A-6C

PROCUREMENT SPECIFICATION: NONE



AEROSPACE STANDARD

(R) SEAL, BONDED, 302 CORROSION RESISTANT
STEEL, AMS5516, MOLD IN GROOVE, SILICONE
RUBBER, AMS7268

AS27197
SHEET 1 OF 6

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ISSUED 2001-03 REVISED 2014-07

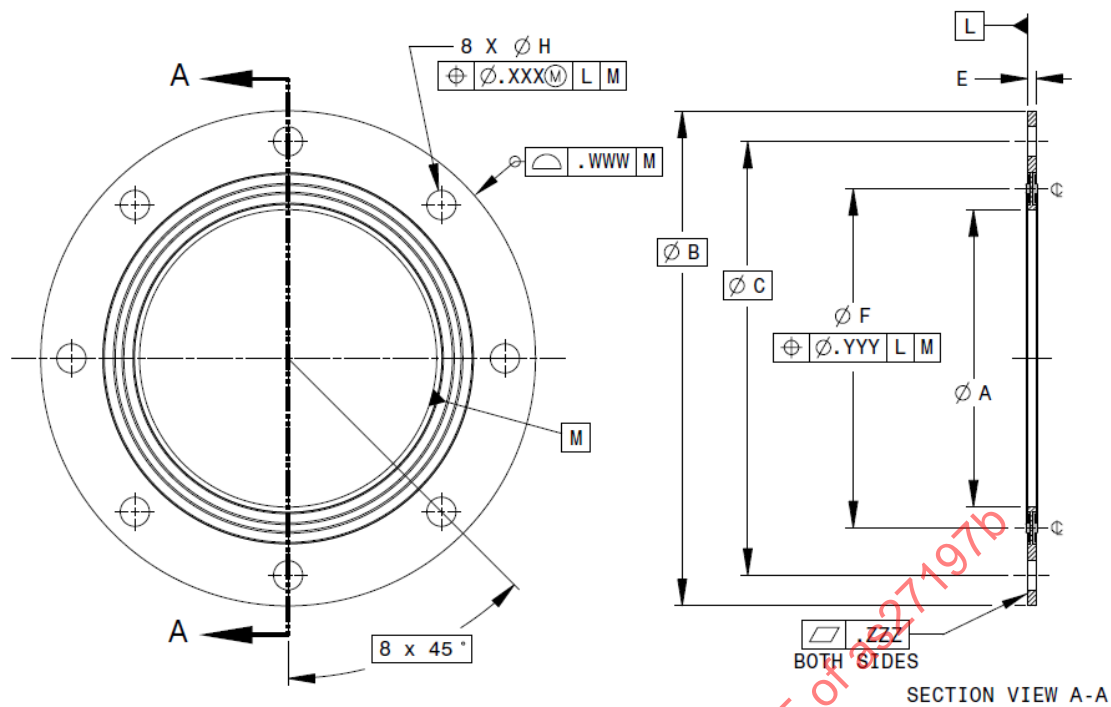


FIGURE 3 - SEAL -56 THRU -64

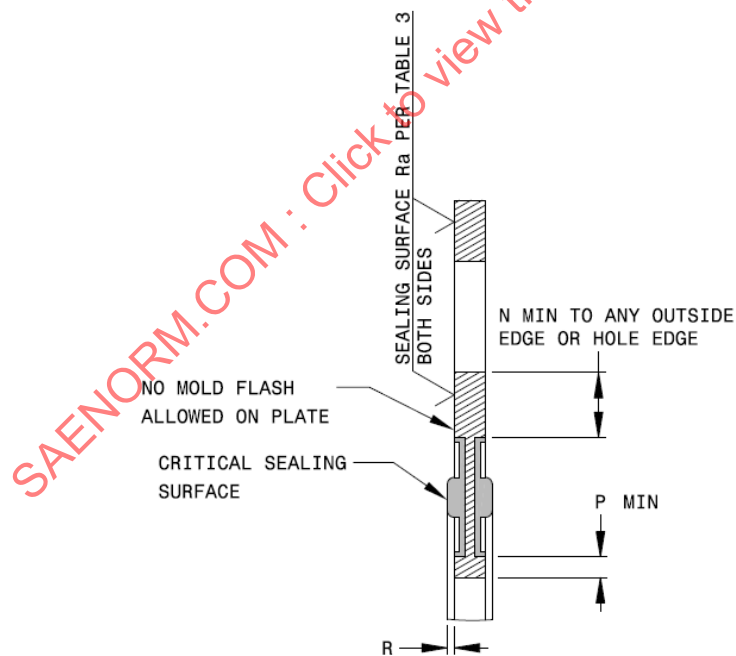
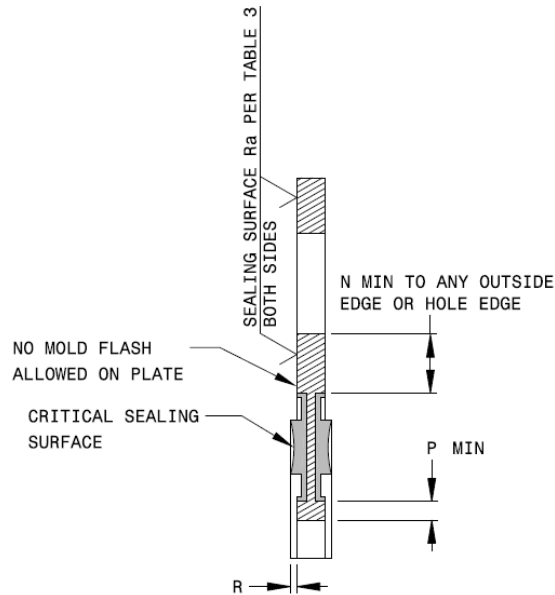


FIGURE 4 - ENLARGED SECTION, TYPICAL FOR ALL SIZES

	AEROSPACE STANDARD (R) SEAL, BONDED, 302 CORROSION RESISTANT STEEL, AMS5516, MOLD IN GROOVE, SILICONE RUBBER, AMS7268	AS27197 SHEET 2 OF 6	REV. B
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NOTE: DIMENSIONING AND TOLERANCING PER ASME Y14.5-2009

FIGURE 5 - OPTIONAL SEAL CONFIGURATION, ENLARGED SECTION, TYPICAL FOR ALL SIZES

TABLE 1A - DIMENSIONS IN INCHES

MS PART NO.	NOMINAL TUBE OD REF.	ØA	B	ØC	ØD	E ±.008	ØF ±.015	G	ØH +.010 -.005	J RAD.	K RAD.
MS27197 -12	3/4	.669	1.594	1.635	1.250	.092	.953	1.156	.205	.219	.219
MS27197 -12-16	3/4	.669	1.750	1.856	1.500	.092	1.203	1.312	.205	.219	.219
MS27197 -16	1	.904	1.750	1.856	1.500	.092	1.203	1.312	.205	.219	.219
MS27197 -16 -24	1	.904	2.375	2.563	2.125	.092	1.734	1.812	.266	.281	.281
MS27197 -20	1 1/4	1.138	2.188	2.342	1.844	.092	1.500	1.656	.266	.266	.266
MS27197 -20 -24	1 1/4	1.138	2.375	2.563	2.125	.092	1.734	1.812	.266	.281	.281
MS27197 -24	1 1/2	1.372	2.375	2.563	2.125	.092	1.734	1.812	.266	.281	.281
MS27197 -32	2	1.841	3.000	3.359	2.750	.092	2.406	2.375	.328	.313	.313
MS27197 -40	2 1/2	2.341	4.000	3.812	3.250*	.092	2.828	-	.328	.375	.375*
MS27197 -48	3	2.841	4.500	4.312	3.750*	.092	3.313	-	.328	.625	.375*
MS27197 -56	3 1/2	3.341	5.563	4.875	-	.092	3.813	-	.328	-	-
MS27197 -64	4	3.841	6.125	5.438	-	.092	4.313	-	.328	-	-

TABLE 1B - DIMENSIONS IN MILLIMETERS

MS PART NO.	NOMINAL TUBE OD REF.	ØA	B	ØC	ØD	E ±0.20	ØF ±0.38	G	ØH +0.25 -0.13	J RAD.	K RAD.
MS27197 -12	3/4	16.99	40.48	41.53	31.75	2.34	24.21	29.36	5.21	5.56	5.56
MS27197 -12 -16	3/4	16.99	44.45	47.14	38.10	2.34	30.56	33.33	5.21	5.56	5.56
MS27197 -16	1	22.96	44.45	47.14	38.10	2.34	30.56	33.33	5.21	5.56	5.56
MS27197-16 -24	1	22.96	60.33	65.10	53.98	2.34	44.05	46.03	6.76	7.14	7.14
MS27197 -20	1 1/4	28.91	55.56	59.49	46.83	2.34	38.10	42.06	6.76	6.75	6.75
MS27197 -20 -24	1 1/4	28.91	60.33	65.10	53.98	2.34	44.05	46.03	6.76	7.14	7.14
MS27197 -24	1 1/2	34.85	60.33	65.10	53.98	2.34	44.05	46.03	6.76	7.14	7.14
MS27197 -32	2	46.76	76.20	85.32	69.85	2.34	61.12	60.33	8.33	7.94	7.94
MS27197 -40	2 1/2	59.46	101.60	96.83	82.55*	2.34	71.83	-	8.33	9.53	9.53*
MS27197 -48	3	72.16	114.30	109.53	95.25*	2.34	84.14	-	8.33	15.88	9.53*
MS27197 -56	3 1/2	84.86	141.29	123.83	-	2.34	96.84	-	8.33	-	-
MS27197 -64	4	97.56	155.58	138.13	-	2.34	109.54	-	8.33	-	-

*SUGGESTED DIMENSIONS FOR "D" AND "K" SIZES -40 THROUGH -48.

	AEROSPACE STANDARD	AS27197 SHEET 3 OF 6	REV. B
	(R) SEAL, BONDED, 302 CORROSION RESISTANT STEEL, AMS5516, MOLD IN GROOVE, SILICONE RUBBER, AMS7268		

TABLE 2A - TOLERANCES IN INCHES

MS PART NO.	.WWW	.XXX	.YYY	.ZZZ
MS27197 - ALL SIZES	.020	.005	.010	.003

TABLE 2B - TOLERANCES IN MILLIMETERS

MS PART NO.	.WWW	.XXX	.YYY	.ZZZ
MS27197 - ALL SIZES	0.51	0.13	0.25	0.08

TABLE 3A - FIGURE 4 AND FIGURE 5 DIMENSIONS IN INCHES

MS PART NO.	N MIN	P MIN	R	MAXIMUM SEALING SURFACE Ra (µin)
MS27197 - ALL SIZES	.050	.060	.020	63

TABLE 3B - FIGURE 4 AND FIGURE 5 DIMENSIONS IN MILLIMETERS

MS PART NO.	N MIN	P MIN	R	MAXIMUM SEALING SURFACE Ra (µm)
MS27197 - ALL SIZES	1.27	1.52	0.51	1.6

APPLICATION:

THESE PRODUCTS HAVE BEEN USED TYPICALLY AT TEMPERATURES UP TO 392 °F (200 °C) WHERE RESISTANCE TO HOT AIR IS REQUIRED.

APPLICABLE REFERENCES:

SAE PUBLICATIONS:

AVAILABLE FROM SAE INTERNATIONAL, 400 COMMONWEALTH DRIVE, WARRENDALE, PA 15096-0001, TEL: 877-606-7323 (INSIDE USA AND CANADA) OR 724-776-4970 (OUTSIDE USA), www.sae.org.

AMS2817	PACKAGING AND IDENTIFICATION PREFORMED PACKINGS
AMS5516	STEEL, CORROSION-RESISTANT, SHEET, STRIP, AND PLATE, 18Cr-9.0Ni (SAE 30302) SOLUTION HEAT TREATED - UNS S30200
AMS7268	RINGS, SEALING, SILICONE RUBBER LOW COMPRESSION SET, NON-OIL RESISTANT 65 - 75
AS478	IDENTIFICATION MARKING METHODS
ARP5316	STORAGE OF ELASTOMER SEALS AND SEAL ASSEMBLIES WHICH INCLUDE AN ELASTOMER ELEMENT PRIOR TO HARDWARE ASSEMBLY
AS5752	AEROSPACE - VISUAL INSPECTION STANDARD FOR ELASTOMERIC SEALING ELEMENTS OTHER THAN O-RINGS

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ANSI/ASQ Z1.4	SAMPLING PROCEDURES AND TABLES FOR INSPECTION BY ATTRIBUTES
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**AEROSPACE STANDARD**

(R) SEAL, BONDED, 302 CORROSION RESISTANT
STEEL, AMS5516, MOLD IN GROOVE, SILICONE
RUBBER, AMS7268

AS27197
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