FEDERAL SUPPLY CLASS
4730

RATIONALE

GRAPHICS REDRAWN FOR CLARITY. UPDATED OUTDATED REFERENCED SPECS. NOTE /14/ REVISED, MATERIAL CODE LETTER SHALL "REPLACE THE DASH CODE" IN LIEU OF "AFTER THE DASH NUMBER." REVISED TABLE 2, SHOWING PROPER "R" MATERIAL CODE LETTER FOR SUPERSEDING PART NUMBER. REMOVED "VAD" FROM PROCUREMENT SPECIFICATION NOTE AS "VAD" ARE APPLICABLE TO HOSES ONLY.

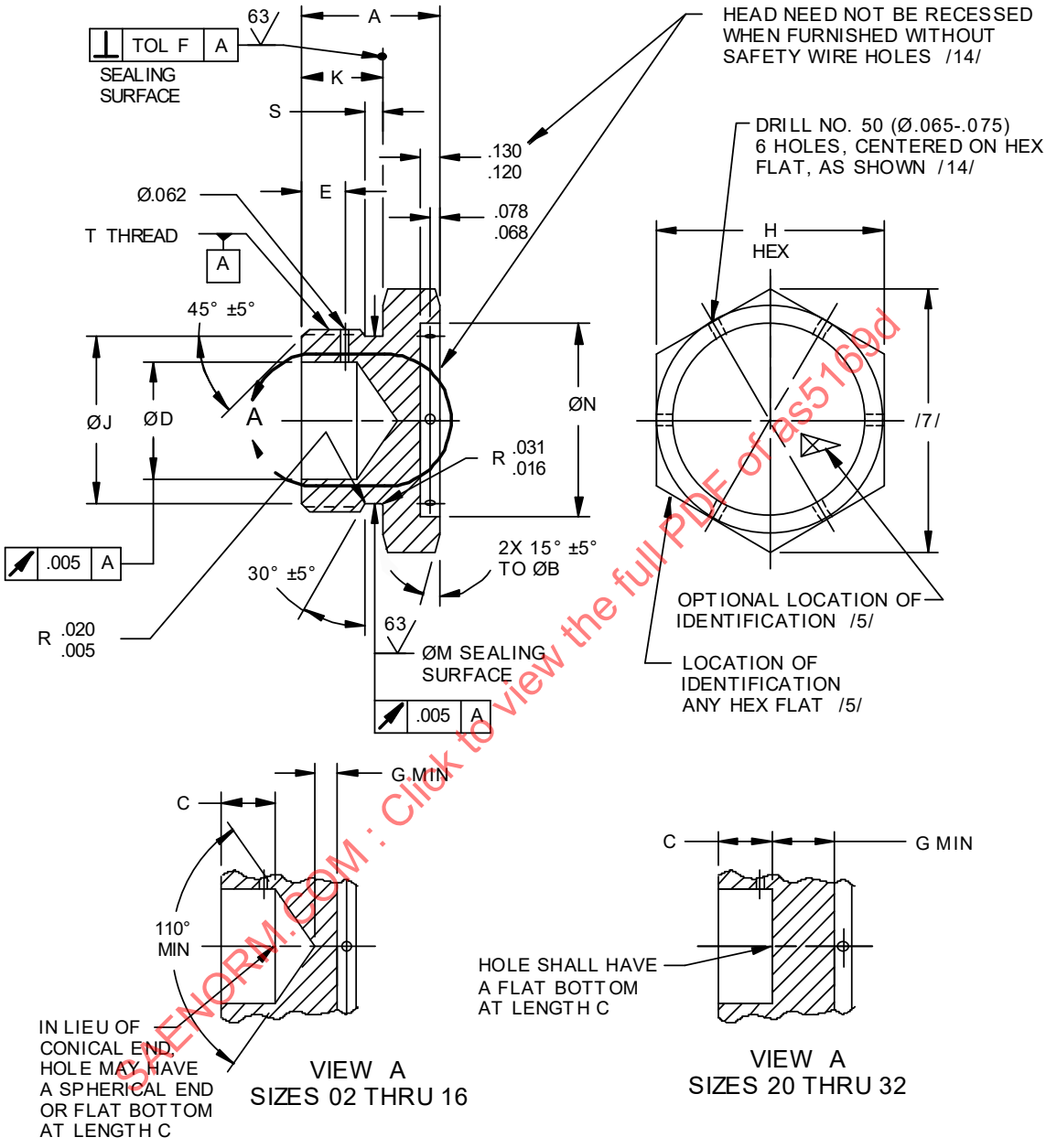
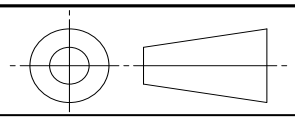


FIGURE 1 - FITTING, PORT PLUG

For more information on this standard, visit
https://www.sae.org/standards/content/AS5169D

THIRD ANGLE PROJECTION



ISSUED 1998-03 REAFFIRMED 2005-06 REVISED 2024-08

CUSTODIAN: G-3/G-3B

PROCUREMENT SPECIFICATION: AS4875 /4/

AEROSPACE STANDARD

FITTING, PORT PLUG AND BLEEDER

TABLE 1A - DIMENSIONS A-F

BASIC NO. AS5169 /13/ SIZE CODE	(NOMINAL TUBE SIZE)	T THREAD PER AS8879 CLASS 3A	A	B ±.010	C +.000/-.016	D ±.005	E ±.031	F
02	.125	.3125-24 UNJF	.547	.542	.266	.062	.156	.005
03	.188	.3750-24 UNJF	.562	.605	.266	.125	.156	.005
04	.250	.4375-20 UNJF	.625	.668	.312	.171	.188	.005
05	.312	.5000-20 UNJF	.625	.730	.281	.234	.188	.005
06	.375	.5625-18 UNJF	.719	.792	.359	.296	.219	.005
08	.500	.7500-16 UNJF	.781	.980	.359	.390	.250	.005
10	.625	.8750-14 UNJ	.781	1.103	.328	.484	.312	.005
12	.750	1.0625-12 UNJ	1.000	1.353	.484	.609	.344	.008
16	1.000	1.3125-12 UNJ	1.000	1.603	.422	.843	.344	.008
20	1.250	1.6250-12 UNJ	1.000	1.853	.609	1.078	.344	.008
24	1.500	1.8750-12 UNJ	1.000	2.099	.609	1.312	.344	.008
28	1.750	2.2500-12 UNJ	1.000	2.474	.531	1.546	.344	.008
32	2.000	2.5000-12 UNJ	1.000	2.724	.516	1.781	.344	.008

TABLE 1B - DIMENSIONS G-S

BASIC NO. AS5169 /13/ SIZE CODE	G	H	J	K	M +.002/-.003	N	S +.015/-.000
02	.109	.552- .565	.219	.312	.250	.312	.063
03	.109	.615- .628	.281	.328	.313	.375	.063
04	.109	.678- .691	.344	.375	.364	.438	.075
05	.125	.740- .753	.406	.375	.427	.500	.075
06	.125	.802- .815	.469	.422	.482	.562	.083
08	.156	.990-1.003	.625	.469	.660	.750	.094
10	.156	1.113-1.128	.750	.531	.773	.875	.107
12	.188	1.363-1.380	.938	.594	.945	1.125	.125
16	.188	1.613-1.630	1.188	.594	1.195	1.375	.125
20	.234	1.863-1.880	1.500	.594	1.507	1.625	.125
24	.234	2.109-2.135	1.719	.594	1.756	1.875	.125
28	.312	2.484-2.510	2.094	.594	2.131	2.250	.125
32	.328	2.734-2.760	2.344	.594	2.381	2.500	.125

TABLE 1C - WEIGHTS

BASIC NO. AS5169 /13/ SIZE CODE	LB/EA APPROX REF AL	LB/EA APPROX REF STEEL	LB/EA APPROX REF TI
02	.00823	.02367	.01305
03	.0105	.03033	.01674
04	.0141	.0406	.0224
05	.0171	.0493	.0271
06	.0234	.0671	.0369
08	.0407	.117	.0646
10	.0493	.141	.0781
12	.099	.283	.156
16	.142	.407	.225
20	.181	.522	.288
24	.229	.658	.363
28	.343	.990	.544
32	.414	1.188	.657

NOTES:

NOTICE

THIS DOCUMENT REFERENCES A PART WHICH CONTAINS CADMIUM AS A PLATING MATERIAL. CONSULT LOCAL OFFICIALS IF YOU HAVE QUESTIONS CONCERNING CADMIUM'S USE.

/1/ MATERIAL: REFER TO PROCUREMENT SPECIFICATION.

ALLOY STEEL
ALUMINUM ALLOY
CORROSION-RESISTANT STEEL
TITANIUM ALLOY

a. DASH AS CODE LETTER: TYPE 4130 PER AMS-S-6758 OR AMS6370 OR TYPE 4140 PER AMS6349 OR AMS6382. /2/

b. CODE LETTER D: TYPE 2024-T6 ALUMINUM ALLOY BAR PER AMS-QQ-A-225/6 OR TYPE 2024-T851 ALUMINUM ALLOY BAR PER AMS-QQ-A-225/6 OR AMS4339.

c. CODE LETTER J: TYPE 304 CORROSION-RESISTANT STEEL BAR PER AMS-QQ-S-763 OR AMS5639.

d. CODE LETTER K: TYPE 316 CORROSION-RESISTANT STEEL BAR PER AMS-QQ-S-763 OR AMS5648.

e. CODE LETTER R: TYPE 321 CORROSION-RESISTANT STEEL BAR PER AMS-QQ-S-763 OR AMS5645.

f. CODE LETTER T: TYPE 6AL-4V TITANIUM ALLOY BAR PER AMS4928.

g. CODE LETTER W: TYPE 7075-T73 ALUMINUM ALLOY BAR PER AMS-QQ-A-225/9 OR TYPE 7075-T7351 ALUMINUM ALLOY BAR PER AMS4124.

h. CODE LETTER S: TYPE 347 CORROSION-RESISTANT STEEL BAR PER AMS-QQ-S-763 OR AMS5646.

/2/ HEAT TREATMENT:

a. DASH AS MATERIAL CODE LETTER: REFER TO HARDNESS REQUIREMENT PER PROCUREMENT SPECIFICATION.

b. OTHER MATERIAL CODE LETTERS: NONE.

/3/ FINISH:

a. DASH AS MATERIAL CODE LETTER: CADMIUM PLATE PER AMS-QQ-P-416, TYPE II, CLASS 2, DYE BLACK AND COAT WITH A LIGHT FILM OF OIL PER PROCUREMENT SPECIFICATION.

b. MATERIAL CODE LETTER D.

(1) ANODIZE PER AMS2472 OR MIL-PRF-8625, TYPE II, CLASS 2, DYE BLUE, DUPLEX SEAL PER PROCUREMENT SPECIFICATION.

(2) D CODE PARTS TO BE COATED WITH HIGH PURITY ALUMINUM ONLY WILL HAVE THE FINISH CODE LETTER “V” PLACED AFTER THE SIZE CODE IN THE PART NUMBER. THE FINISH WILL BE: COAT WITH HIGH PURITY ALUMINUM PER MIL-DTL-83488, CLASS 3, TYPE II, WITH MAXIMUM COATING THICKNESS OF .0005. GLASS BEAD PEEN PRESSURE SHALL BE 25 PSI MAXIMUM. REFER TO PROCUREMENT SPECIFICATION FOR ADDITIONAL REQUIREMENTS.

c. MATERIAL CODE LETTERS J, K, R, AND S: PASSIVATE PER AMS2700, TYPE 6 OR TYPE 7.

d. MATERIAL CODE LETTER T: ANODIZE PER AMS2488 OR FLUORIDE PHOSPHATE CONVERSION COAT PER AMS2486 WITH COLOR PER PROCUREMENT SPECIFICATION.

e. MATERIAL CODE LETTER W.

(1) ANODIZE PER AMS2472 OR MIL-PRF-8625, TYPE II, CLASS 2, DYE BROWN, DUPLEX SEAL PER PROCUREMENT SPECIFICATION.

(2) W CODE PARTS TO BE COATED WITH HIGH PURITY ALUMINUM ONLY WILL HAVE THE FINISH CODE LETTER “V” PLACED AFTER THE SIZE CODE IN THE PART NUMBER. THE FINISH WILL BE: COAT WITH HIGH PURITY ALUMINUM PER MIL-DTL-83488, CLASS 3, TYPE II, WITH MAXIMUM COATING THICKNESS OF .0005. GLASS BEAD PEEN PRESSURE SHALL BE 25 PSI MAXIMUM. REFER TO PROCUREMENT SPECIFICATION FOR ADDITIONAL REQUIREMENTS.

/4/ PROCUREMENT SPECIFICATION: AS4875, EXCEPT AS SPECIFIED IN THIS STANDARD. PRODUCT MANUFACTURED TO THIS STANDARD SHALL MEET THE REQUIREMENTS SPECIFIED HEREIN AND THE PROCUREMENT SPECIFICATION. ORIGINAL COMPONENT MANUFACTURERS (OCM) SHALL BE LISTED IN THE NADCAP QUALIFIED MANUFACTURER LIST (QML) FOR THIS PRODUCT TYPE. THE QML IS AVAILABLE AT www.eAuditNet.com.

/5/ IDENTIFICATION AT LOCATION SHOWN: MARK PER AS478 CLASS C OR D, OR METHOD 7A3, 15A3, OR 15B.

a. FOR SIZE 06 AND SMALLER: MANUFACTURER’S NAME, CAGE CODE OR TRADEMARK, LETTER “AS,” AND MATERIAL CODE LETTER.

b. FOR SIZE 08 AND LARGER: MANUFACTURER’S NAME, CAGE CODE OR TRADEMARK, BASIC PART NUMBER, AND MATERIAL CODE LETTER.

6. INTENDED USE: THIS PART IS DESIGNED FOR USE IN SYSTEMS WITH MAXIMUM OPERATING PRESSURES AS SPECIFIED IN THE PROCUREMENT SPECIFICATION.

/7/ THE HEX CORNERS MAY BE ROUNDED PER ARP1942.

8. INTERPRETATION OF DRAWING PER AS4296.

9. SURFACE TEXTURE: SYMBOLS PER ASME Y14.36M. REQUIREMENTS PER ASME B46.1. UNLESS OTHERWISE SPECIFIED, MACHINED SURFACES TO BE 125 MICROINCHES Ra. SURFACES OF HEX FLATS MAY BE 250 MICROINCHES Ra.

10. BREAK EDGES .003 TO .015, UNLESS OTHERWISE SPECIFIED.

11. DIMENSIONING AND TOLERANCING: ASME Y14.5M-1994.

12. DIMENSIONS ARE IN INCHES. UNLESS OTHERWISE SPECIFIED, TOLERANCES: LINEAR DIMENSIONS ±.015, ANGULAR DIMENSIONS ±0°30'.