

SAE Technical Standards Board Rules provide that: "This report is published by SAE to advance the state of technical and engineering sciences. The use of this report is entirely voluntary, and its applicability and suitability for any particular use, including any patent infringement arising therefrom, is the sole responsibility of the user."  
 SAE reviews each technical report at least every five years at which time it may be reaffirmed, revised, or cancelled. SAE invites your written comments and suggestions.

**REV. C**  
**AS473**

FEDERAL SUPPLY CLASS

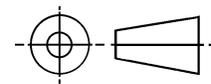
**NONCURRENT NOTICE**

THIS SPECIFICATION HAS BEEN DECLARED "NONCURRENT" AS OF JANUARY 2001. IT IS RECOMMENDED, THEREFORE, THAT THIS DOCUMENT NOT BE SPECIFIED FOR NEW DESIGNS.

EACH OF THESE "NONCURRENT" DOCUMENTS IS AVAILABLE FROM SAE.

SAENORM.COM : Click to view the full PDF of as473c

THIRD ANGLE PROJECTION



ISSUED 1957-11 REVISED 1963-02 NONCURRENT 1971-08 REAFFIRMED NONCURRENT 2001-01

CUSTODIAN: SAE COMMITTEE AE-1



**AEROSPACE STANDARD**

FLANGE-ACCESSORY, 10" BOLT CIRCLE

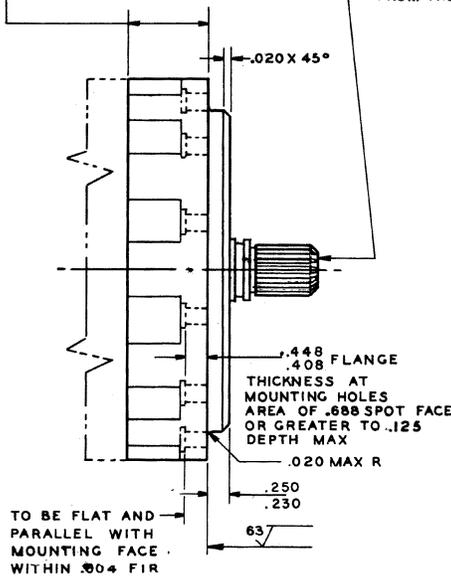
**AS473**  
SHEET 1 OF 3

**REV. C**

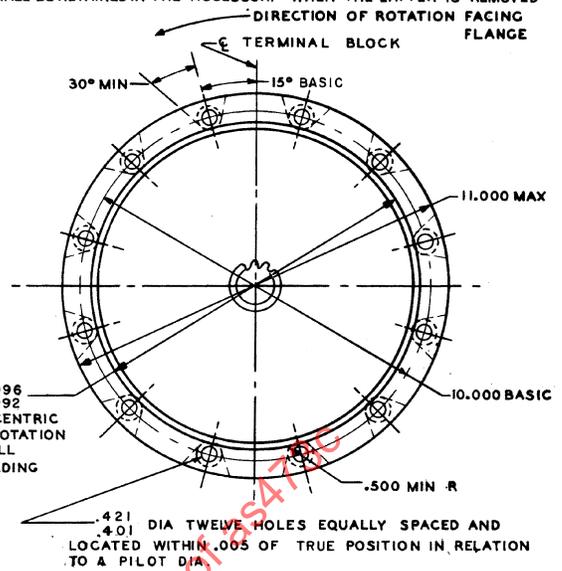
REV.  
C

AS473

BOLT CLEARANCE MIN 1.375  
PREFERRED 1.750



ACCESSORY SHALL BE CAPABLE OF SATISFACTORY OPERATION WITH THE PITCH DIAMETER CENTER OF DRIVE SPLINE DISPLACED TO A MAXIMUM .006 IN ANY DIRECTION FROM THE CENTER DEFINED BY THE A PILOT DIAMETER AND OUT OF SQUARE WITH MOUNTING FACE WITHIN .001 INCH/INCH OF INDICATED DIA FIR. SPLINE SHAFT SHALL BE RETAINED IN THE ACCESSORY WHEN THE LATTER IS REMOVED FROM THE POWER SOURCE



POWER RATINGS

FLANGE TYPE	SPLINE PD	(a) MAX HP VARIABLE SPEED	(b) MAX HP BASED ON 6000 RPM CONSTANT SPEED	(b) MAX HP BASED ON 8000 RPM CONSTANT SPEED	O RING SIZE CROSS SECTION .135-.143	
					ID ACTUAL	OD NOMINAL
A	0.800	30 (15 KVA)	65 (40 KVA)	95 (60 KVA)	0.728-0.740	1.000
B	1.200	85 (40 KVA)	190 (120 KVA)	250 (160 KVA)	1.103-1.115	1.375
C	1.625	190 (90 KVA)	250 (160 KVA)		1.478-1.490	1.750
D	1.875	250 (120 KVA)			1.724-1.744	2.000
E	2.000	335 (160 KVA)			1.849-1.869	2.125

- (a) HP INCLUDES COMBINED EFFICIENCY OF 64% FOR AC GENERATORS AND CONSTANT SPEED TRANSMISSION.
- (b) HP INCLUDES EFFICIENCY OF 85% FOR AC GENERATORS.

THE NOMINAL USE OF THIS FLANGE IS FOR AC AND DC AIRCRAFT GENERATORS, CONSTANT SPEED TRANSMISSIONS (DRIVES), AND HIGH SPEED FLUID POWER PUMPS.

THE STATIC TORSIONAL STRENGTH OF THE ACCESSORY DRIVE SHAFT SHALL NOT EXCEED 5 TIMES THE FULL LOAD TORQUE RATING OF THE ACCESSORY AT MINIMUM RATED SPEED. (FOR AC GENERATORS, FULL LOAD IS BASED ON UNITY POWER FACTOR.)

THE ACCESSORY SHALL OPERATE SATISFACTORILY WITH OIL LEAKAGE FROM THE DRIVE INTO THE PILOT COMPARTMENT NOT EXCEEDING 2 CC PER HOUR.

IN THE EVENT OF A SHEAR SECTION FAILURE, THE ACCESSORY SHALL BE DESIGNED TO PREVENT DISENGAGEMENT OF THE DRIVE SPLINE COMPONENT. REMOVE ALL BURRS AND SHARP EDGES.

DIMENSIONS IN INCHES. UNLESS OTHERWISE SPECIFIED, TOLERANCES: DECIMALS ± .010, ANGLES ± 2°.

THIS DRAWING AND THE APPLICABLE ACCESSORY SPECIFICATIONS, TOGETHER, COMPLETELY DEFINE THE DESIGN REQUIREMENTS.

FOR EXHAUST SHROUD MOUNTING SURFACES ON AIR COOLED AC AND DC GENERATORS, SEE A/P 954 AND 955.

SURFACE ROUGHNESS SYMBOL  $\sqrt{\quad}$ , AS 291 (AA).

THIS IS A DESIGN STANDARD AND IS NOT TO BE USED AS A PART NUMBER.

FOR DETAILS OF MATING DRIVE, SEE AS 470.

FOR DETAILS OF SLOTTED MOUNTING HOLE FLANGE, SEE AS 474.

FOR DETAILS OF O RING SEALED MOUNTING FLANGE, SEE AS 481.