

THE USE OF RETAINING, SEALING AND LOCKING COMPOUNDS APPLIED TO THE THREADS OR BEARING SURFACES OF AIRCRAFT THREADED COMPONENTS SHALL BE SUBJECT TO THE FOLLOWING LIMITATIONS.

1. SHALL NOT BE USED ON THREADED COMPONENTS EXCEPT THOSE THAT ARE USED IN A PERMANENT OR SEMI-PERMANENT INSTALLATION. SUCH AN INSTALLATION WOULD BE THE USE OF A THREADED FASTENER WHERE A RIVET TYPE FASTENER WOULD NORMALLY BE USED.
2. SHALL BE APPLIED TO THE THREADS AND BEARING SURFACES BEFORE ASSEMBLY OF THE COMPONENTS.
3. SHALL NOT BE USED ON THREADED FASTENERS UNLESS THE EXTERNALLY THREADED FASTENER IS PRELOADED AT INSTALLATION. THE PRELOAD SHALL BE GREATER THAN 20% OF THE ULTIMATE STRENGTH OF THE FASTENER.
4. SHALL NOT BE USED AS A PRIMARY LOCKING OR RETAINING METHOD IN THOSE APPLICATIONS WHERE THE FAILURE OF THE COMPOUND TO SEAL, RETAIN OR LOCK WOULD ENDANGER THE SAFETY OF PERSONNEL OR WOULD RENDER THE EQUIPMENT INOPERATIVE OR CAUSE IT'S DESTRUCTION.
5. SHALL NOT BE USED IN STRUCTURAL AND CONTROL SYSTEM APPLICATIONS EXCEPT AS AN AUXILIARY LOCKING OR RETAINING METHOD.
6. SHALL NOT BE USED IN APPLICATIONS WHERE THE OPERATING TEMPERATURES ARE HIGHER THAN 200°F.
7. SHALL NOT BE USED ON THREADED COMPONENTS FOR WHICH A TORQUE OR PRELOAD VALUE IS SPECIFIED FOR ASSEMBLY. UNLESS IT IS FEASIBLE TO DISCARD AND REPLACE THESE BY NEW COMPONENTS. THREADED FASTENERS PREVIOUSLY TREATED WITH SUCH COMPOUNDS SHALL NOT BE REUSED. THESE FASTENERS SHALL BE REPLACED BY NEW FASTENERS NEWLY COATED.
8. THE COMPOUNDS SHALL BE IN ACCORDANCE WITH MIL-S-22473, MIL-S-46163, MIL-R-46032 AND THE FOLLOWING REQUIREMENTS:
 - (a) THE COMPOUND SHALL NOT ACCELERATE GALVANIC OR STRESS CORROSION OF CADMIUM PLATING, CORROSION RESISTANCE STEELS, ALUMINUM ALLOYS, OR TITANIUM ALLOYS IN NAVAL AIRCRAFT ENVIRONMENTS.
 - (b) THE COMPOUND SHALL NOT CAUSE DEGRADATION OF THE FINISHES PRESCRIBED IN MIL-F-7179 OR OTHER APPROVED FINISH MATERIALS.
 - (c) THE COMPOUND SHALL NOT CAUSE DEGRADATION OR REDUCE ADHESION OF TANK SEALANT MATERIALS COVERED BY MIL-S-8802, OR OTHER POLYSULFIDE MATERIALS.
 - (d) THE COMPOUND SHALL NOT ACCELERATE OR CAUSE DEGRADATION OF AIRCRAFT FUELS, LUBRICANTS, AND HYDRAULIC FLUIDS, WHICH MAY BE IN CONTACT WITH COMPOUND.
 - (e) THE COMPOUND SHALL BE INERT IN THE PRESENT AIRCRAFT FUELS, LUBRICANTS, AND HYDRAULIC FLUIDS.
9. THE USE OF RETAINING OR ADHESIVE AND SEALING COMPOUNDS SHALL BE USED ONLY WHERE NO OTHER SATISFACTORY MEANS EXIST.

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REVISED AND RETYPED

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TITLE

COMPOUNDS, ADHESIVE, AIRCRAFT DESIGN AND USE LIMITATIONS
FOR THREADED COMPONENTS RETAINED, SEALED OR LOCKED BY

MILITARY STANDARD

MS18069

PROCUREMENT SPECIFICATION

SUPERSEDES:

SHEET

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