



# Technical Standard Order

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**Subject: TSO-C85a, SURVIVOR LOCATOR LIGHTS**

a. Applicability.

(1) Minimum Performance Standards. This technical standard order (TSO) prescribes the minimum performance standards that survivor locator lights must meet in order to be identified with the applicable TSO marking. New models of survivor locator lights that are to be so identified and that are manufactured on or after the date of this TSO must meet the standard set forth in Society of Automotive Engineers, Inc. (SAE), Aerospace Standard (AS) 4492, "Survivor Locator Lights," dated January 1995.

(2) Environmental Standards. SAE AS 4492 incorporates by reference the environmental test procedures specified in RTCA, Inc., (RTCA) Document No. DO-160C, "Environmental Conditions and Test Procedures for Airborne Equipment," dated December 1989. A more recent version of this standard and tests may be substituted, if approved by the manager of the aircraft certification office (ACO), Federal Aviation Administration (FAA), having geographical purview over the manufacturer's facilities.

(3) Previously Approved Articles. Survivor locator lights approved prior to the date of this TSO may continue to be manufactured under the provisions of their original approval.

b. Marking. Each survivor locator light must be marked in accordance with 14 CFR 21.607(d).

c. Data Requirements.

(1) In addition to the documentation specified in 14 CFR 21.605(a), the manufacturer shall furnish or have available for review, at the discretion of the manager of the ACO, FAA having geographical purview of the manufacturer's facilities, one copy each of the following technical data:

(i) A complete description of the survivor locator light, including detail drawings or drawing list, material identification and process specification.

- (ii) Operating instructions and limitations.
- (iii) Installation instructions and limitations, including stowage area temperatures.
- (iv) Packaging instructions and limitations.
- (v) Maintenance instructions, including information regarding inspection, repair, stowage of materials, recommended inspection intervals and service life.
- (vi) Manufacturer's TSO qualification test report with an environmental qualification form, as described in RTCA/DO-160C.
- (vii) The quality control inspection and functional test specification to be used to test each production article to ensure compliance with this TSO, as required by reference in 14 CFR 21.605(a)(3) to 14 CFR 21.143.

(2) In addition, the manufacturer must furnish, to each person receiving for use one or more of the articles manufactured under an authorization of this TSO, one copy of the following:

(i) The technical data and information specified in paragraphs (c)(1)(ii) through (c)(1)(v) of this TSO and any other data or information that are necessary for continued airworthiness of the survivor locator lights.

(ii) A note with the following statement:

“The conditions and test required for TSO approval of this article are minimum performance standards. It is the responsibility of those desiring to install the article either on or within a specific type or class of aircraft to determine that the aircraft installation conditions are within the TSO standards, the article may be installed only if further evaluation by the applicant documents an acceptable installation and is approved by the Administrator.”

d. Availability of Referenced Documents.

(1) Copies of SAE AS 4492 may be purchased from the Society of Automotive Engineers, Inc., Department 331, 400 Commonwealth Drive, Warrendale, PA 15096.

(2) Copies of RTCA Document No. DO 160C may be purchased from the RTCA, Inc., 1140 Connecticut Avenue, NW, Suite 1020, Washington, DC 20036-9325.

(3) Federal Aviation Regulations, Part 21, Subpart O, and Part 25, Subpart D may be purchased from the Superintendent of Documents, U.S. Government Printing Office, Washington, DC 20402-9325.

(4) Advisory Circular 20-110H, "Index of Aviation Technical Standard Orders," or latest revision may be obtained from the U.S. Department of Transportation, Subsequent Distribution Office Ardmore East Business Center, 3341 Q 75th Avenue, Landover, MD 20785.

/S/ John K. McGrath  
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