Cancelled 00-2FF

Federal Aviation Agency

ADVISORY CIRCULAR

AC NO: AC 150/5345-38
AIRPORTS
EFFECTIVE: 3/23/67

SUBJECT: CHANGES TO AIRPORT LIGHTING EQUIPMENT

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1. PURPOSE. This advisory circular describes changes to airport lighting equipment and is published by the Federal Aviation Agency for the guidance of the public.

2. CANCELLATION. AC 150/5345-8, Specification for L-840 Low Intensity Runway, Landing Strip and Taxiway Light, dated November 4, 1963, is cancelled.

3. REFERENCES.

   a. AC 150/5340-13, High Intensity Lighting System, dated March 30, 1965.

   b. AC 150/5340-16, Medium Intensity Runway Lighting System, dated October 28, 1966.

   c. AC 150/5345-12, Specification for L-801 Beacon for Small Airports, dated February 3, 1964.

   d. AC 150/5345-27, Specification for L-807 Eight-Foot Illuminated Wind Cone, dated February 10, 1965.

   e. Specification CAA-291, Specification for Beacons, 36-Inch Rotating, Double Ended Type, dated July 31, 1944.

4. BACKGROUND.

   a. A recent study indicated that the medium intensity runway lighting (MIRL) installation is economical overall and has design features that can give more reliable performance than the low intensity runway lighting (LIRL) installation. Although the LIRL initial installation costs are somewhat less, increased maintenance frequently makes the overall costs higher. One of the factors adding to the expense of installing a MIRL is the requirement for a 36-inch airport beacon at those sites;

whereas, a LIRL installation requires a small L-801 beacon. Another factor increasing the costs has been the custom of installing an 8-foot wind cone at LIRL airports and a 12-foot wind cone at MIRL airports.

b. As a result of the study, proposals were sent to all FAA Regional Offices, Agency Services, and interested aviation organizations for comments. The proposals were to eliminate future installation of low intensity lighting and the 12-foot wind cone assembly, that the 36-inch beacon be installed at airports only where high intensity runway lighting (HIRL) systems are in use, and that the L-801 beacon be utilized with MIRL systems.

c. The comments received on the above proposal were varied but the majority favored it. Until a new beacon can be developed and tested, the L-801 is the most appropriate beacon to use on airports with MIRL systems, and at airports with HIRL systems the 36-inch beacon should be used. The intensity of runway lighting being used is an indicator of the type of beacon required; that is, the higher the intensity of runway lighting, the higher the intensity of the beacon. There will be exceptions to this general rule; thus, 36-inch beacons may be installed on MIRL airports where conditions justify it.

5. LIGHTING EQUIPMENT. The following changes in existing criteria should be used when installing airport lighting equipment.

a. MIRL systems should be used on all airports where HIRL systems cannot be justified under existing standards.

b. Pending development of a new beacon, the 36-inch beacon should be used on all HIRL airports and the L-801 should be used on all MIRL airports unless special justification exists for the use of a 36-inch beacon at a MIRL site. Special conditions which would justify such an installation would be high background brightness caused by neighboring lights or the use of the beacon for a navigational aid rather than its usual role to help the pilot locate and identify an airport.

c. The 8-foot wind cone should be used at all the airports unless the use of a 12-foot wind cone can be justified due to special siting conditions.

6. HOW TO OBTAIN PUBLICATIONS. Obtain additional copies of this circular, AC 150/5345-38, Changes to Airport Lighting Equipment, and other referenced circulars from the Federal Aviation Agency, Distribution Unit, HQ-438, Washington, D.C. 20553.

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