



U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL AVIATION ADMINISTRATION

Air Traffic Organization Policy

ORDER
JO 7110.310

Effective Date:
December 17, 2009

SUBJ: Implementation of Automatic Dependent Surveillance-Broadcast (ADS-B) Air Traffic Control (ATC) Services in the Gulf of Mexico at Houston Air Route Traffic Control Center (ARTCC)

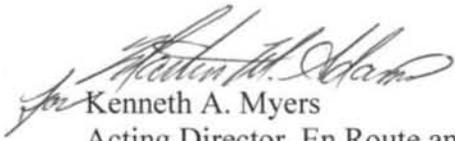
- 1. Purpose of This Order.** This order prescribes guidance for the provision of ATC services at Houston ARTCC using ADS-B information.
- 2. Audience.** This order applies to the Air Traffic Organization (ATO) En Route and Oceanic Service Unit.
- 3. Where Can I Find This Order?** The order is available on the MYFAA employee Web site at https://employees.faa.gov/tools_resources/orders_notices/ and on the air traffic publications Web site at http://www.faa.gov/airports_airtraffic/air_traffic/publications.
- 4. Explanation of Policy Changes.** ADS-B surveillance information will be incorporated into the Houston ARTCC automation system to support radar separation and procedures in the Gulf of Mexico area. Targets derived from ADS-B will be indistinguishable from targets derived from conventional surveillance sources until the implementation of fusion in the En Route Automation Modernization (ERAM) system. This order prescribes guidance for the use of ADS-B information for ATC services that will remain in effect until the implementation of fusion in ERAM, and the implementation of any visual indicators for aircraft with ADS-B equipment.
- 5. Guidance.**
 - a.** All procedures contained in FAA Order JO 7110.65 for the en route domain related to ATC services using secondary radar, to include radar identification, separation, advisories, and phraseology, apply to targets derived from ADS-B.
 - b.** Targets derived from ADS-B must not be used in en route automation systems for 3 NM separation under the provisions of paragraph 5-5-4, MINIMA.
 - c.** Only those ADS-B equipped aircraft that have been approved and certified by the FAA Aviation Safety organization (AVS) will be displayed by Host/ERAM. Initially, only a small minority of helicopters will receive AVS certification. As aircraft upgrade to the FAA's new minimum operational performance standards for advanced ADS-B transponders, the number of ADS-B equipped aircraft that will be displayed in the Gulf of Mexico area will be expected to increase. The determination as to whether an ADS-B aircraft meets acceptable performance standards is software-driven and no controller intervention is required or expected. Accordingly, if an ADS-B equipped aircraft is displayed by Host/ERAM in an area of adequate ADS-B-only coverage, then the provisions of subparagraph 5.a. may be applied for that target.
 - d.** Current software used to display ADS-B targets in the Gulf of Mexico area requires the receipt of Mode C altitude information from the aircraft's transponder. Accordingly, no target will be displayed

in an ADS-B-only coverage area for any ADS-B aircraft with a failed or inoperable Mode C transponder, or is not transmitting Mode C altitude information. In particular, controllers can expect the loss of target information for any aircraft that is instructed to stop altitude squawk in accordance with the provisions of Paragraph 5-2-17, Validation of Mode C Readout, subparagraph c. Controllers must transition to nonradar/procedural separation and coordination procedures for any ADS-B aircraft that is instructed to stop altitude squawk, or has a failed or inoperable Mode C transponder in an ADS-B-only coverage area.

6. Action. The Houston ARTCC air traffic manager must ensure that the provisions of this order are briefed to all front-line managers, controllers-in-charge, and operational air traffic controllers prior to the initial operational use of ADS-B.

7. Distribution. This order is distributed to the following ATO service units: En Route and Oceanic, Safety Services; and Air Traffic Safety Oversight Service.

8. Safety Management System. This order does not change any existing separation standards and does not create or revise any ATC procedures or phraseology. Accordingly, no further safety risk management analysis is warranted.



Kenneth A. Myers
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and Operations Support

12-09-09

Date Signed