



**Federal Aviation
Administration**

Initial En Route Qualification Training

**Lesson 36
Radar Separation
And Safety Alerts
End-of-Lesson Test**

Course 50148001

Intentionally left blank

Initial En Route Training

Lesson 36

Radar Separation and Safety Alerts

End-of-Lesson Test – Variation 1

Lesson Objectives:

On an End-of-Lesson Test and in accordance with FAA Order JO 7110.65, you will identify:

- Radar separation procedures and minima
 - Safety alert procedures
 - E-MSAW alert conditions
 - Conflict Alert procedures
 - Mode C validation conditions
-

Directions: Items 1 through 13 are multiple choice. Indicate your selection by circling the appropriate letter.

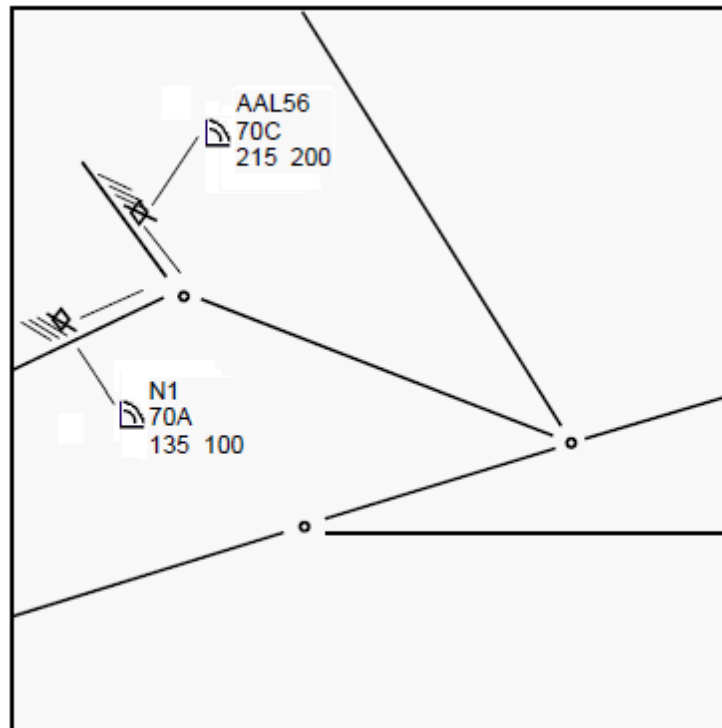
1. Separation must be applied between which portions of the digitized radar targets?
 - A. End of beacon, end of primary
 - B. End of beacon, center of primary
 - C. Center of beacon, end of primary
 - D. Center of beacon, center of primary

2. Radar separation must be applied to all RNAV aircraft operating on a random route at or below flight level _____.
 - A. 600
 - B. 450
 - C. 240
 - D. 180

RADAR SEPARATION AND SAFETY ALERTS

End-of-Lesson Test – Variation 1 (Continued)

3. Aircraft operations should be separated from Special Use and Air Traffic Control Assigned Airspace laterally below FL600 by _____ miles and FL600 and above by _____ miles.
- A. 2; 4
 - B. 3; 6
 - C. 4; 6
 - D. 5; 7



4. In the diagram above, if both AAL56 and N1 are more than 40 miles from the radar antenna, you must provide a minimum separation of _____ miles between targets.
- A. 10
 - B. 5
 - C. 3
 - D. 2½

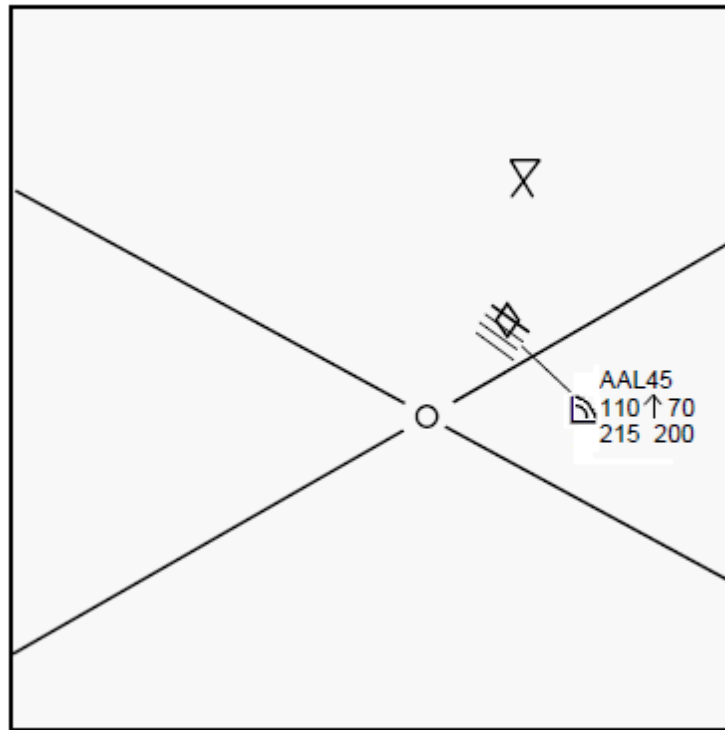
RADAR SEPARATION AND SAFETY ALERTS

End-of-Lesson Test – Variation 1 *(Continued)*

5. To separate an aircraft from a standard formation flight, add _____ mile(s) to appropriate radar minima.
- A. 1
 - B. 1½
 - C. 2
 - D. 2½
6. When necessary, assign the appropriate _____ to each aircraft in the formation or to the first and last aircraft in the trail.
- A. separation
 - B. beacon code
 - C. altitude
 - D. target
7. The priority given to issuing safety alerts is the same as that given to _____.
- A. separating aircraft
 - B. issuing SIGMETs
 - C. issuing traffic advisories
 - D. avoiding severe weather
8. If you observe the aircraft in unsafe proximity to an obstruction in another sector, you _____.
- A. must inform the appropriate controller
 - B. may assume that a safety alert has been issued
 - C. may disregard, because safety alerts do not apply to obstructions
 - D. should issue a safety alert to the aircraft

RADAR SEPARATION AND SAFETY ALERTS

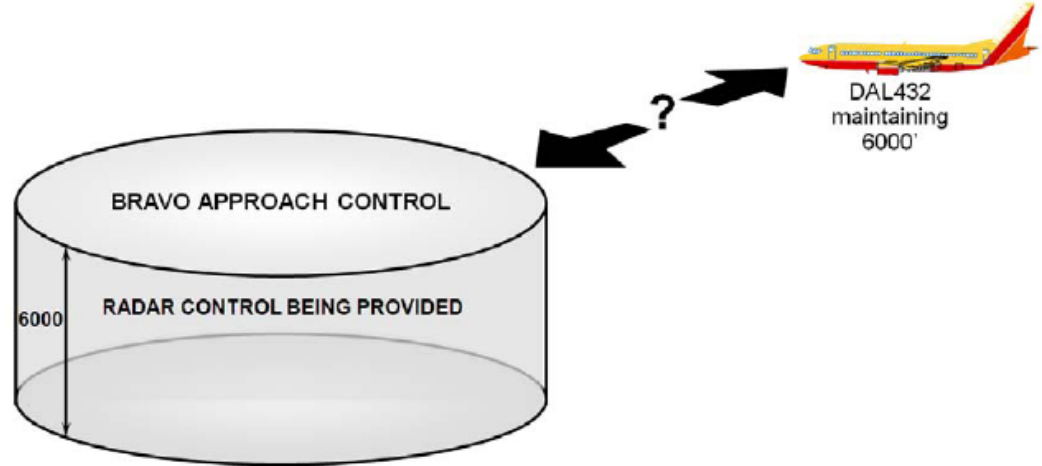
End-of-Lesson Test – Variation 1 (Continued)



9. In the diagram above, how many miles must AAL45 be vectored from the obstruction, assuming vertical clearance will NOT be obtained?
- A. 10
 - B. 5
 - C. 3
 - D. 2½
10. The phraseology to request a pilot to validate an altitude when operating below the lowest usable flight level is “_____.”
- A. REQUEST ALTITUDE
 - B. VALIDATE ALTITUDE
 - C. SAY YOUR ALTITUDE
 - D. SAY ALTITUDE

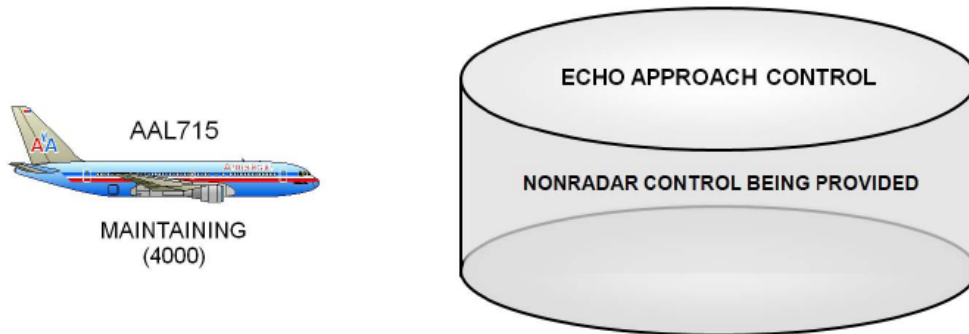
RADAR SEPARATION AND SAFETY ALERTS

End-of-Lesson Test – Variation 1 (Continued)



11. In the diagram above, what is the minimum number of miles the center controller must keep between Bravo Approach Control airspace and DAL432?

- A. 10
- B. 5
- C. 2½
- D. 1½



12. In the diagram above, what is the minimum number of miles AAL715 must be separated from Echo Approach Control airspace?

- A. 10
- B. 5
- C. 3
- D. 2½

RADAR SEPARATION AND SAFETY ALERTS
End-of-Lesson Test – Variation 1 *(Continued)*

13. A controller would suppress a Conflict Alert because _____.
- A. the controller has received invalid readouts
 - B. the situation has definitely been corrected
 - C. the computer initiated the alert in error
 - D. appropriate action has been or will be taken