

k. ILS Course and Glideslope Distortion

1. All pilots should be aware that ILS installations are subject to signal interference by surface vehicles and aircraft (either on the ground or airborne). ILS CRITICAL AREAS are established near each localizer and glide slope antenna. Pilots should be aware of the level of critical area protection they can expect in various weather conditions and understand that signal disturbances may occur as a result of normal airport operations irrespective of the official weather observation.

2. ATC is not always required to issue control instructions to avoid interfering operations within ILS critical areas at controlled airports during the hours the Airport Traffic Control Tower (ATCT) is in operation. ATC responsibilities vary depending on the official weather observation and are described as follows:

(a) **Weather Conditions.** Official weather observation indicates a ceiling of 800 feet or higher and visibility 2 miles or greater, no localizer or glideslope critical area protection is provided by ATC unless specifically requested by the flight crew.

(b) **Weather Conditions.** Official weather observation indicates a ceiling of less than 800 feet or visibility less than 2 miles.

(1) **Holding.** Aircraft holding below 5,000 feet between the outer marker and the airport may cause localizer signal variations for aircraft conducting the ILS approach. Accordingly, such holding will not be authorized by ATC.

(2) **Localizer Critical Area.** When an arriving aircraft is inside the outer marker (OM) or the fix used in lieu of the OM, vehicles and aircraft will not be authorized in or over the precision approach critical area except:

[a] A preceding arriving aircraft on the same or another runway may pass over or through the localizer critical area, and;

[b] A preceding departing aircraft or missed approach on the same or another runway may pass through or over the localizer critical area.

(3) **Glide Slope Critical Area.** ATC will not authorize vehicles or aircraft operations in or over the glideslope critical area when an arriving aircraft is inside the outer marker (OM), or the fix used in lieu of the OM, unless the arriving aircraft has reported the runway in sight and is circling or side-stepping to land on another runway.

(c) **Weather Conditions.** Official weather observation indicates a ceiling less than 200 feet or runway visual range (RVR) less than 2000 feet.

(1) **Localizer Critical Area.** In addition to the critical area protection described in 1-1-9k2(b) above, when an arriving aircraft is inside the middle marker (MM), or in the absence of a MM, ½ mile final, ATC will not authorize:

[a] A preceding arriving aircraft on the same or another runway to pass over or through the localizer critical area, or;

[b] A preceding departing aircraft or missed approach on the same or another runway to pass through or over the localizer critical area.

3. In order to ensure that pilot and controller expectations match with respect to critical area protection for a given approach and landing operation, a flight crew should advise the tower any time it intends to conduct any autoland operation or use an SA CAT I, any CAT II, or any CAT III line of minima anytime the official weather observation is at or above a ceiling of 800 feet and 2 miles visibility. If ATC is unable to protect the critical area, they will advise the flight crew.

EXAMPLE-

*Denver Tower, United 1153, Request Autoland (runway) ATC replies with:
United 1153, Denver Tower, Roger, Critical Areas not protected.*