



July 18, 2022

Mr. Billy Nolen
Acting Administrator
Federal Aviation Administration
800 Independence Avenue, SW
Washington, DC 20591

Dear Acting Administrator Nolen,

We the undersigned airline associations represent almost all of the more than 100 foreign airlines that currently serve the United States market. We are writing to express our strong concern regarding the decision by the Federal Aviation Administration (FAA) to require that specific large commercial aircraft be retrofitted with new or modified radar altimeters (RadAlts) by July 2023 in order to continue to utilize Category 2 and 3 low visibility procedures when landing at most major US airports. As presented to the industry, this mandate will have a negative impact on the ability of major foreign carriers to maintain normal operations to the United States, as well as potentially impact other global operations, where US airports are selected as destination alternates.

We have been told that the July 2023 deadline is necessary because 18 additional telecommunications companies (telcos) will then be prepared to power up their 5G networks to the full capacity authorized by the Federal Communications Commission (FCC). The FAA has stated that allowing aircraft to continue to conduct landing operations in Category 2 and 3 conditions without retrofitting/modifying RadAlts to protect against potential 5G interference raises unacceptable safety risks. Rather than insisting that these telcos reduce their power levels and employ other mitigation measures, the FAA has decided to instead mandate that carriers retrofit their aircraft to remove the threat of 5G interference. The FAA characterized the deadline as “ambitious, but doable.”

While much deference needs to be given to the FAA on critical safety issues, the following factors argue strongly against the viability of this July 2023 deadline:

- The FAA has yet to initiate any formal regulatory process, including, but not limited to, the issuance of a notice of proposed rulemaking and an airworthiness directive requiring carriers to retrofit by July 2023. Many foreign carriers cannot move forward with meeting a notional FAA deadline without the ability to formally justify this significant unforeseen and non-budgeted expense and aircraft downtime to their executive committee and in some cases – such as state-owned carriers – their governments. Simply referring carriers to their original equipment manufacturer (OEM) for information on the terms of the deadline is not acceptable.
- At the July 7, 2022, FAA 5G Roundtable, the RadAlt manufacturers reported that supply chain issues will make it extremely difficult for them to deliver enough retrofit kits to enable airlines to meet the July 2023 deadline. This will be particularly true for foreign carriers given the clear focus on meeting the needs of the US domestic market.
- The FAA has not yet certified the retrofit solutions being offered by the RadAlt manufacturers. It is unrealistic for the FAA to demand that airlines make multi-million-dollar budget decisions on the purchase of equipment not yet approved and standardized by the FAA as an assured solution to the potential interference challenge.
- The OEMs have not issued the required service bulletins which communicate details of the required modifications, such as the various components to be embodied in aircraft. Carriers cannot be expected to commit financial resources unless and until they have a clear understanding of what they are required to purchase.

- The FAA has not issued any formal guidance or regulatory requirement on the exact performance specifications for current and/or future RadAlts vis-à-vis 5G interference. Again, simply referring carriers to OEMs and RadAlt manufacturers for this information is not acceptable.
- The classification of various RadAlts continues to change, most recently with the decision that Airbus A220s are now considered Group 3 aircraft. Carriers cannot be expected to commit to retrofits when the aircraft groups remain fluid.
- Following the availability of the service bulletins, the minimum lead time for various OEM retrofit solutions is estimated at 6-9 months, leaving little time for installation on impacted aircraft before the July deadline.
- The FAA acknowledges that not all Group 3 aircraft will be retrofitted by 2023 and that airlines will need to segment their fleet accordingly in order to serve US airports. Foreign carriers will find it extremely challenging to restrict their aircraft fleet, possibly down to specific tail numbers that can service US destinations. All carriers require a degree of aircraft fleet interoperability to ensure that their schedules are reliable, and the specific aircraft type chosen can operate globally.
- Carriers (US and international) are receiving no assurances that they will not be subject to a second retrofit of their RadAlts as new 5G equipment comes online in the future that allows for the transmission of stronger 5G C-Band signals. Expecting carriers to make urgent investments on a retrofit now without any visibility or assurance against a potential second retrofit is at best unrealistic.
- The potential exclusion of foreign carriers from US markets due to an inability to meet the retrofit deadline raises potential issues under relevant US bilateral air service agreements.

Given all of the above factors, we urge the FAA to work with all relevant parties including airlines, airframe OEMs, Rad Alt manufacturers, telcos, and the FCC, to achieve a solution that more fairly and realistically allocates the responsibility to ensure that 5G and aviation can safely co-exist both in the short and long term. Examples of workable solutions can be found in recent actions by both the Governments of Canada and Brazil to condition 5G spectrum allocation to include needed protections of vital commercial aviation operations. The global commercial airline industry stands ready to work with the FAA and the other partners in good faith to identify and implement a workable solution to this safety challenge.

Thank you for your consideration.

Sincerely,

African Airlines Association (AFRAA)
 Airlines for Europe (A4E)
 Arab Air Carriers' Organization (AACO)
 Association of Asia Pacific Airlines (AAPA)
 Association of South Pacific Airlines (ASPA)
 Latin American and Caribbean Air Transport Association (ALTA)
 International Air Transport Association (IATA)
 National Airlines Council of Canada (NACC)