

# Vaisala Low Level Windshear Alert System

**VAISALA**

Product Spotlight

**Providing trusted aviation weather from cloud to ground**

The anemometer-based Vaisala Low Level Windshear Alert System (LLWAS) is the most widely used solution for airports that experience low-level horizontal windshear. The LLWAS is part of the Vaisala AviMet® Windshear Alert System: a scalable, end-to-end solution suitable for any airport in the world, whatever its traffic or unique conditions.



## Key benefits

In clear skies or stormy weather, the LLWAS provides air traffic control and pilots with an immediate, shared understanding of windshear dangers and necessary actions.

Vaisala's experts conduct detailed site surveys to determine the best windshear alert system configuration for your airport, and ensure optimal sensor placement and operation in almost any airport geography.

LLWAS is affordable, making it a good choice for many kinds of airports. The solution uses the latest windshear algorithms developed for the FAA, is patented by UCAR, and is fully compliant to ICAO standards and recommendations, as well as WMO regulations.

Part of the AviMet Windshear Alert System, the LLWAS is designed and built on common Vaisala technologies and components for seamless compatibility and expandability with other airport weather systems.

## Why Vaisala?

For over 45 years, Vaisala has been a pioneer in aviation weather technology, ensuring that every measure is taken for unparalleled safety, efficiency, and sustainability.

Our gold standard suite of solutions is trusted in more than 170 countries and over 2000 airports globally. In fact, every commercial flight around the world will use weather observations produced by Vaisala equipment or forecasts driven by our sensor measurements at some point in their journey.

With a commitment to constantly evolving our portfolio, Vaisala remains at the forefront of the industry, continuously exploring new horizons.

Vaisala aviation experts conduct detailed site surveys to determine the optimal combination of the three best detection technologies - anemometer-based LLWAS, X-band Weather Radar and wind lidar -- to deliver the most comprehensive and dependable windshear awareness solution available.

The ground-based LLWAS measures and issues alerts for windshear of 15-30 knots and microbursts of 30+ knots, up to 1,000 feet AGL. With 90% or greater probability of microburst detection, coupled with 10% or less probability of false alerts, the solution sends immediate, actionable alerts to pilots and air traffic control for quick responses, shared situational awareness, and successful windshear avoidance.

The LLWAS uses the latest windshear algorithms developed for the U.S. Federal Aviation Administration (FAA) and patented by the University Corporation for Atmospheric Research Foundation (UCAR). The solution is fully compliant to ICAO standards and recommendations, as well as WMO regulations.

The LLWAS consists of an array of ultrasonic wind sensors installed around your airport's runways and approach corridors. The solution can be deployed as a standalone system, as an extension to an existing AWOS, or as part of the AviMet Windshear Alert System.

Look to Vaisala for dependable support, project capabilities, and training so you can get the most from your system. With decades of experience providing the best technologies and the finest support, our philosophy of partnership is unmatched in the industry.

