

Vaisala Transmissometer LT31

The industry's most accurate runway visibility data



Key Benefits

Simplified compliance

As part of an RVR system, the LT31 enables airports to meet relevant ICAO requirements, as well as crucial national/local certifications for CAT I to CAT III airports.

The best data for decisions and peace of mind

The LT31 provides the highest level of precision possible for RVR — especially in critical, low-visibility situations — regardless of the phenomena causing reduced visibility. With LT31, you can fully satisfy ICAO desirable accuracy for RVR.

Fail-safe operation

By their nature, transmissometers will report lower-than-actual visibility if there is a disturbance to the measurement. This contrasts with forward scatter sensors, which can report higher-than-actual visibility. Referred to as fail-safe operations, this important advantage of transmissometer ensures safety.

Low maintenance costs

With extensive self-diagnostics, ruggedness, and automation, the LT31 provides maximum uptime while minimizing the need for maintenance — saving airports time, cost, and resources.

Transmissometer technology is proven to provide the best visibility measurement accuracy for Runway Visual Range (RVR), and Vaisala's LT31 is the most trusted and frequently used transmissometer in the world. With low installation and lifetime operating costs, the LT31 is also the most pioneering transmissometer technology. It automates many critical functions to provide unmatched accuracy, outstanding uptime, and minimal maintenance needs.

Transmissometer measurement resembles human observations. It directly measures light attenuation (reduction in light) between the transmitter and receiver and thus is independent of the type of visibility reducing particles present, ensuring the best accuracy in the most crucial low-visibility situations. Specifically designed for airport environments, the LT31 provides precise data under any conditions, including dust and sand.

With LT31, airports have the necessary information to ensure safety of runway operations while maximizing capacity during all types of weather.

*Trusted aviation
weather from
cloud to ground*

LT31 Transmissometer at a glance

Key features

Vaisala-patented automatic calibration ensures measurement performance consistency

Automatic alignment significantly reduces the need for manual work

Intelligent contamination avoidance and compensation using optimized hood and blower designs, as well as automatic contamination measurement and adjustment compensation

Meteorological Optical Range (MOR) of 10km, covering the full required range for CAT I through CAT IIIB airports, as well as ICAO-defined visibility range for aeronautical use

Full compliance with ICAO and WMO requirements

White LED light source providing maximum accuracy in all types of weather

Straightforward maintenance and no need for manual realignments

Optional present weather reporting that provides additional insight into airport weather conditions



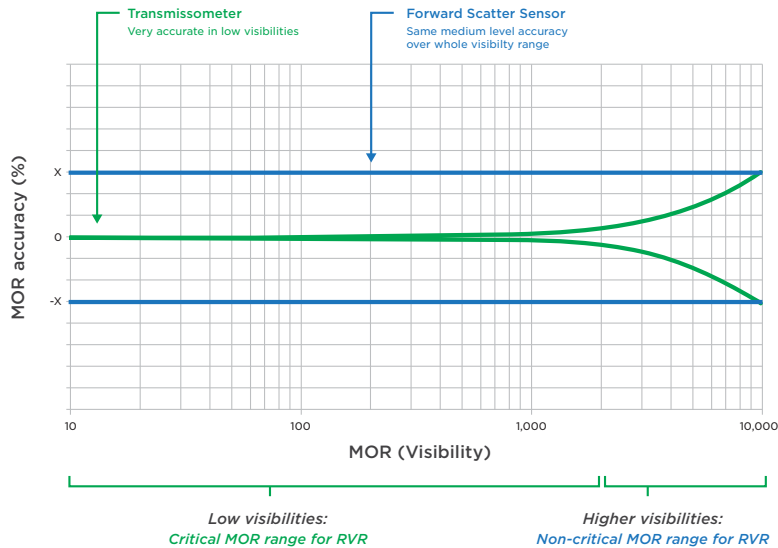
Why Vaisala?

Vaisala technology, including the LT31, is the industry standard by which other solutions are judged. Through 80 years of research and improvement, and with over 45 years of aviation expertise, our sensors provide the best data attainable and extremely high value over time. Users around the world trust Vaisala technology to provide the right data when it counts the most.

Support and services you can count on

Success isn't just about technology. It's about having the backing of a global partner that can directly support your business end-to-end, with complementary services, robust customer service, and consultation. When customers choose Vaisala, they are never alone.

Accuracy of measurement principle



vaisala.com/LT31



Scan the code for more information

Ref. B212136EN-A ©Vaisala 2020

This material is subject to copyright protection, with all copyrights retained by Vaisala and its individual partners. All rights reserved. Any logos and/or product names are trademarks of Vaisala or its individual partners. The reproduction, transfer, distribution or storage of information contained in this brochure in any form without the prior written consent of Vaisala is strictly prohibited. All specifications — technical included — are subject to change without notice.