

LB 567 Micro-Polar II

Concentration • Water content • Dry substance

Monitoring Processes - online and in real time

In chemical and power plants right through to the food industry - product characteristics such as concentration, water content or dry substance can be reliably monitored in a wide variety of industrial sectors, using the measuring system

Micro-Polar II. The measurement is carried out online and can be installed directly on the pipe or tank.

Besides solutions and pastes, Micro-Polar II is also successful in the measurement of suspensions. The measurement on the pipes is non-contact and since there are no fixtures attached to the inside of the pipe, no additional cleaning is required. The system is maintenance free and works error and trouble-free for years on end.

The microwave-based measurement works irrespective of colour, viscosity or inhomogeneities of the product. The measurement of the entire material cross section provides a high level of representativeness of the measurement.

Outstanding reliability and accuracy

Micro-Polar II combines highest technological know-how from more than 20 years experience in the microwave measuring technology with a superior customer-orientation and application-related expertise.

The system offers further potential applications and impresses by a significant increase of the measuring accuracy.

enhanced dynamics

Due to the dynamic uprating of more than 30%, the Micro-Polar II provides a reliable measuring solution, even for just small variations in concentration/water content. Large pipe diameters (of up to DN 150) can also be measured.

more measuring effect

the high frequency range makes sure that even minimum changes of concentration can be determined, especially needed for small pipe diameters or small measuring ranges.

high Measuring Safety

by broadening the frequency band, a higher accuracy is achieved. Any possible influences by reflection are compensated reliably.

simple operation and handling

The software, developed in collaboration with customers, as well as the large display make for a convenient operation of the system. The fully automatic calibration can be carried out directly on the system.

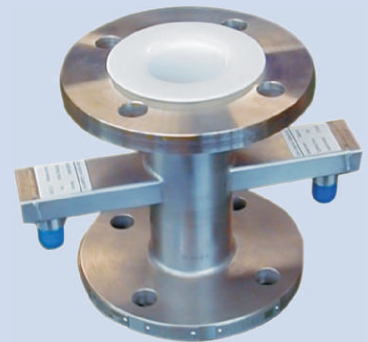
Powder and bulk materials

Combined with horn antennas, the Micro-Polar II can also be applied on conveyor belts and chutes.



System Highlights

- online
- maintenance-free
- highly representative
- extremely reliable and accurate
- irrespective of colour, viscosity or inhomogeneities of the medium
- universal applications



Microwave Measurement

The microwave penetrates the medium and thereby polarises the water molecules inside. As a result, the microwave loses some of its energy and becomes smaller and slower. The higher the concentration or the water content of the medium, the bigger the changes in the microwave.

Micro-Polar II provides an additional reference path, which guarantees for a reliable compensation of cable drift or external temperature changes, as shown in the graphic.