

autoMAP inspector

**In-line inspection of
headspace gas of packages
using laser spectroscopy**



- **Less waste**
- **100% of shipped products can be tested**
- **Traceability – test documentation is available for shipped products**
- **Reduced costs due to less need of manual labour of MAP testing**
- **Potentially increased trust in the brand due to fewer complaints and recalls**

The GASPOROX autoMAP inspector is a completely non-destructive and non-intrusive inspection system for automatic in-line monitoring of gas inside sealed packages.

This in-line solution offers the opportunity to keep track of the MAP gas of all produced packages. The information allows the producer to maintain traceability of all products, production discrepancies as well as to identify variations in MAP gas throughout each batch.

How it works

With a GASPOROX autoMAP inspector system one or several laser sensors are positioned in the packaging line, checking the MAP gas inside each package as it passes by. Each sensor detects one gas, e.g. one O₂ sensor and one CO₂ sensor. As the package passes by, a trigger starts the laser sensor and a value of the gas concentration is presented on the display and stored in the computer system.



Specifications

autoMAP inspector with O₂ sensor: 101 tray

General

Gas:	O ₂
Gas levels:	0-100%
Accuracy*:	±1,5% abs
Speed:	10-70 cm/s
Measurement time:	≥0.1 s

*Accuracy depends on sample geometry and other factors. The given accuracy refers to measurements of trays (≥14 cm length) with minced meat packed in 60% oxygen atmosphere, at a conveyor belt speed of 40 cm/s. For low oxygen applications the accuracy is higher.

Technology

The autoMAP inspector is based on Tunable Diode Laser Absorption Spectroscopy (TDLAS). The laser sensor technology has been developed by GASPOROX and GASPOROX's technology partner/supplier, and is also used in many industrial settings, including the petrochemical, pharmaceutical, and energy industries.