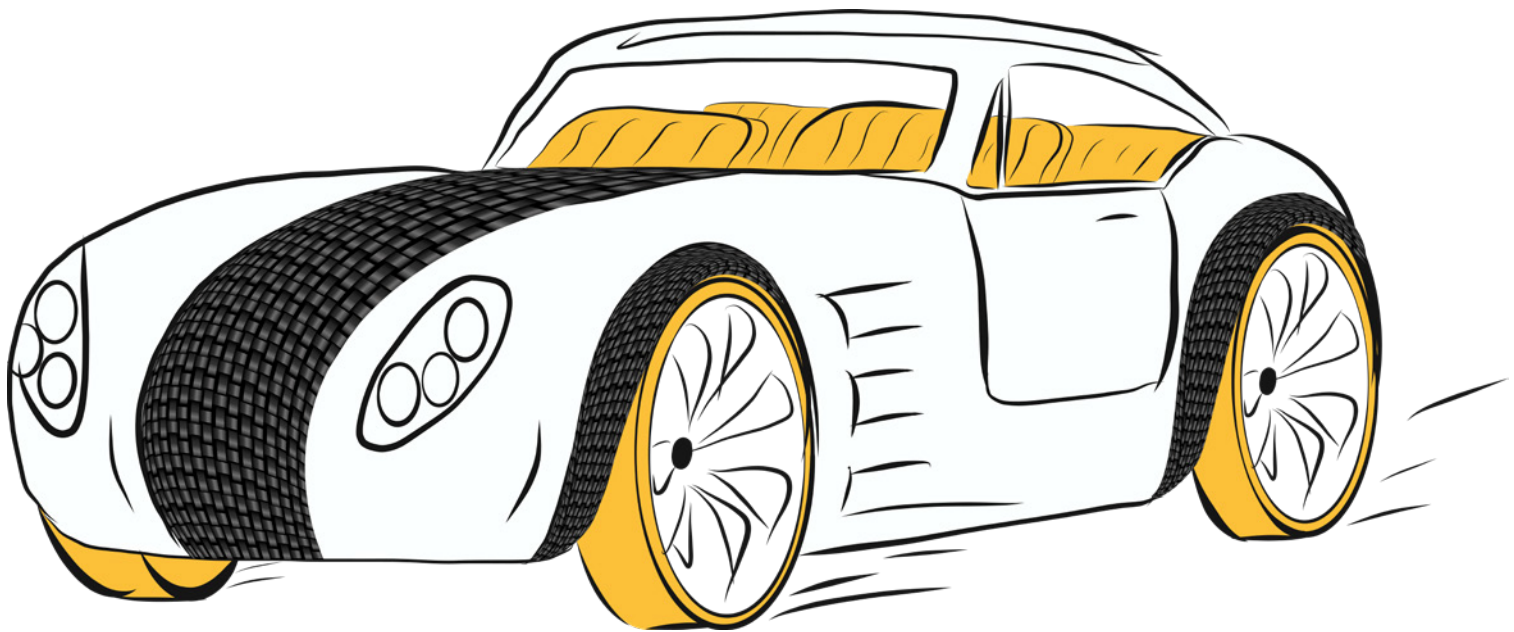




Loepfe

## ZERO-DEFECT MANUFACTURING OPTICAL YARN DEFECT SENSOR FOR CARBON



**Weavers of carbon fabrics rely on WeftMaster® FALCON-i.  
Ready for more performance?**

# READY FOR MORE PERFORMANCE WITH WEFTMASTER FALCON-i

## + OPTICAL YARN DEFECT SENSOR FOR CARBON

People's concerns about adverse effects from pollution on our living environment is growing. Industries are being forced to reduce their impact on the environment. Transportation accounts for up to one third of all CO2 emissions and cars generate a major share of the pollution. The need to reduce the weight of a car in order to cut its emissions or to increase its range is clear. Steel is getting replaced by carbon fiber based composites and car interiors are being provided with luster by using carbon fabric inlays. The quality of the carbon fabric is crucial for reaching the expected performance.

In the case of inlay-components with a carbon look, even the smallest irregularities are a problem. Hence, carbon fabrics must have controlled quality to avoid sporadic defects. Weavers of carbon fabrics who are working closely together with car manufacturers don't take any risks - they rely on Loepfe's FALCON-i to keep fluff or filamentation out of their top quality fabrics. By using the unique detection features of Loepfe's FALCON-i yarn sensor to remove fluff or filamentation from the weft-yarn, waste is dramatically reduced in the carbon fabric production process. A simple calculation reveals that there's a quick return on investment for the weaver.

The applications where FALCON-i can improve product quality are not limited to those mentioned here. Coated technical fabrics such as tarpaulins or sailcloth can only be perfect when using FALCON-i for weaving the base material, in order to avoid fish-eye defects.

Weavers with a focus on high quality technical textiles benefit from using the unique detection capabilities of FALCON-i to improve the quality of their products while avoiding customer claims or expensive patching.

FALCON-i offers selectable sensitivity levels to cope with many different applications. Since the sensor is optical, the nature or conductivity of the yarn processed is of minor importance. Smooth yarn guidance allows for very selective fault sensitivity settings.

This specialized yarn sensor product is in high demand for the production of technical textile fabrics that find their application in automotive, medical, aeronautics, filtration, recreational sports, renewable energy - and many other industries too.

## + MEETS YOUR NEEDS

Removing smallest knots, fluff and filamentation

- Detects knots, fluff and filamentation
- Allows easy handling with intuitive user interface and a chemical resistant housing
- Ensures suitable settings with 9 different sensitivity levels
- Provides automatic or manual sensitivity setting
- Makes installation and setup quick and easy
- Uses simple standard industrial connector
- Provides signals with a PNP and NPN output
- Provides processor controlled optical detection

## + FACTS & FIGURES

Adaptive quality control

- Mono- and multifilament yarns
- Carbon fibers
- All yarn colors
- Yarn range of 20 – 3000 dTex
- Yarn speed up to 30 meters/second

