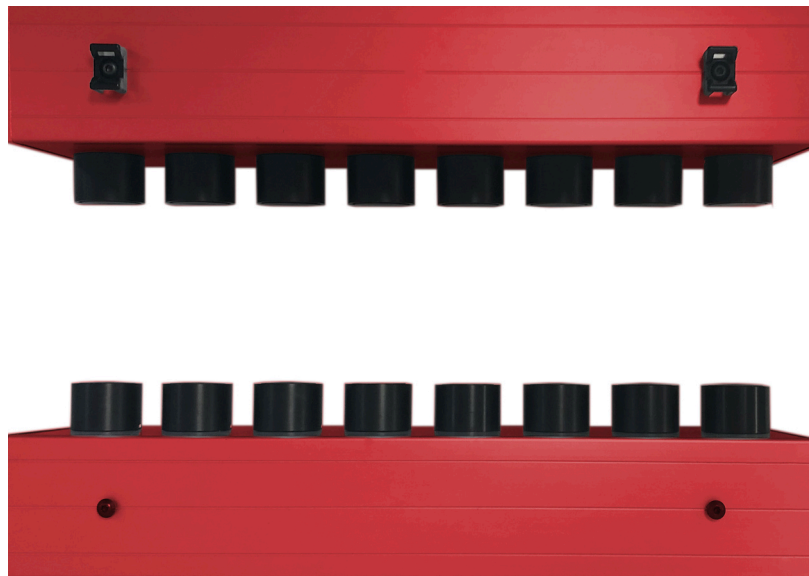


EddyCus® TF inline Sensorline – Full Area Inline Monitoring

P_T_sensorline_20



Highlights

- ▶ Contact free and real time
- ▶ Accurate measurement
- ▶ High degree of variability and flexibility
- ▶ High sample rate up to 1,000 measurements per second
- ▶ Full width measurement

Applications

- ▶ Architectural glass (LowE)
- ▶ Touch screens and flat monitors
- ▶ OLED and LED
- ▶ Smart-glass
- ▶ Transparent antistatic foils
- ▶ Photovoltaics
- ▶ Semiconductors
- ▶ De-icing and heating
- ▶ Batteries and fuel cells
- ▶ Packaging materials

Parameters

- ▶ Sheet resistance (Ohm/sq)
- ▶ Metal layer thickness (nm, μm)
- ▶ Metal substrate thickness (μm)
- ▶ Distance [μm]
- ▶ Anisotropy
- ▶ Defects
- ▶ Integrity assessment

Materials

- ▶ Wafer
- ▶ Metal films and meshes
- ▶ Conductive oxides
- ▶ Nanowire films
- ▶ Graphene, CNT, Graphite
- ▶ Printed films
- ▶ Conductive polymers (PEDOT:PSS)
- ▶ Other conductive films and materials

SURAGUS GmbH
Maria-Reiche-Strasse 1
01109 Dresden
Germany

For further questions:
+49 351 32 111 520

sales@suragus.com

Visit us at:
www.suragus.com
www.suragus.com/calculator
www.suragus.com/EddyCusSensorline

Engineered and Made in Germany





Sheet resistance measurement technology	Non-contact eddy current sensor
Substrates	Foils, glass, wafer, paper etc.
Measurement gap size	3 / 5 / 10 / 15 / 25 / 50 / 75 mm
Number of sensor pairs / monitoring lanes	Up to 128 sensors
Sensor sizes (W x L x H) in mm	Sensor M: 80 x 100 x 66 Sensor S: 34 x 48 x 117
Conductive layers	Metals/ TCOs/ CNTs/ nanowires/ graphene/ grids/ PEDOT/ others
Sheet resistance range accuracy can be optimized over sheet resistance decade within a customer specified range	Low 0.0001 – 10 Ohm / sq; 2 to 7 % accuracy Standard 0.01 – 1,000 Ohm / sq; 2 to 7 % accuracy High 10 – 100,000 Ohm / sq; 3 to 7 % accuracy
Metal thickness measurement range	2 nm – 2 mm (in accordance with sheet resistance)
Sensor pitch	40 mm (5 to 100 mm on request)
Environment	Ex-vacuo/ in-vacuo @ T < 60°C / 140°F (on request <90°C / 194°F)
Sample rate	1 / 10 / 50 per second
Hardware trigger	5 / 12 / 24 V
Interfaces	UDP, .Net libraries, TCP, Modbus, analog/digital
Available options	8-sensor array, 40 mm pitch (total array width of 320 mm)* 16-sensor array, 40 mm pitch (total array width of 640 mm)* 32-sensor array, 40 mm pitch (total array width of 1,280 mm)* 48-sensor array, 40 mm pitch, (total array width of 1,920 mm)* 64-sensor array, 40 mm pitch (total array width of 2,560 mm)*

* with standard sensor housing

Software – EddyCus® TF inline Series

- ▶ Several views and user level
- ▶ Live view with upper and lower limits and alarm functions
- ▶ Analysis view providing statistics
- ▶ Can handle data of several thousands measurements per second
- ▶ Data storage into SQL database
- ▶ Customizable automated data export (csv, txt, xls,...)
- ▶ Several smart functions (automated DB cleaning, self-reference etc.)
- ▶ Parameterizable I/O modules (triggering of actions or alarms)

