



Introducing Exner's In-Line Sensor

EXcell

 **EXNER**
Process Equipment

About EXNER Process-Equipment

Based in Ettlingen, Germany, EXNER develops and produces high-quality armatures and control systems integrating process sensors of variable parameters and optical sensors into various industrial sectors worldwide.

Clients from various industrial sectors such as water treatment, chemicals, power plant, food, pharmaceuticals and others maintain continuous and longtime business relations to Exner and benefit from our consulting and application services. In addition Exner offers its parts to OEM partners around the globe.

EXNER's Cell Growth Sensor „EXcell“

Main advantages and benefits:



- » Modern, long-life LED technology with various Optical Pathlengths available
- » High density measurement range up to 7 AU (Absorption Units)
- » Integrated measurement amplifier, no additional (standard) transmitter required
- » Real-time in-line measurements with a huge amount of data points and an outstanding rapidity and repeatability
- » Revision and re-calibration by optical filters, no chemicals needed
- » Simple calibration against existing off-line standards
- » Switchable to all current turbidity units e. g. TEF, FTU, EBC, mg/l
- » Free configurable and adjustable unit of measurement (Customer Defined Unit)
- » Hygienic, maintenance free design applicable to changeover devices for automated cleaning of the optical unit such as EXNER's Extract Series
- » Connectable via USB, Modbus RS485 and 0-20 mA-Interface

EXNER's EXcell – Sensing your needs.

The ExCell probe is easily applicable in many industrial sectors, such as:



EXcell 230 Specifications

Measuring Range	0...7 AU 0...7.700 EBC
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Wavelength	880 nm
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Light Source	LED
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Optical Path Lengths	5, 10, and 20 mm
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Wetted Materials	Stainless Steel 1.4435 (316L)
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Surface Finish	electropolished Ra >0.4 µm
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Windows	Sapphire
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Cable Connector	VarioPin 6 pol
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Cable Length	2 and 5 meter standard, 15 meter maximum
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Process Connection	PG 13.5 Thread
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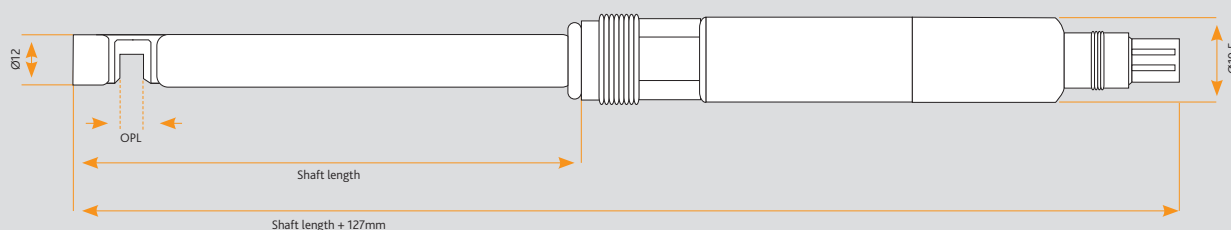
Process Temperature	0 to 90 °C, 135 °C maximum for 2 hours (SIP cycle)
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Process Pressure	10 bar (150 psig) maximum at 25 °C
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Probe Length	120, 225, 325, 425 mm
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Interfaces	USB Modbus RS485 0...20mA and contactors
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Dimensions



EXNER's EXcell – In line with Your process.

Exemplary assembly

The EXcell probe

Fermenter

Laptop

for calibration and
parametrization

Communication
Interface ECI-02

Top Hat Rail Installation
Modbus RS485
24 V/DC



Communication
Interface ECI-03

Control Panel Installation
Touch Display
0...20 mA / 2 Contactors



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