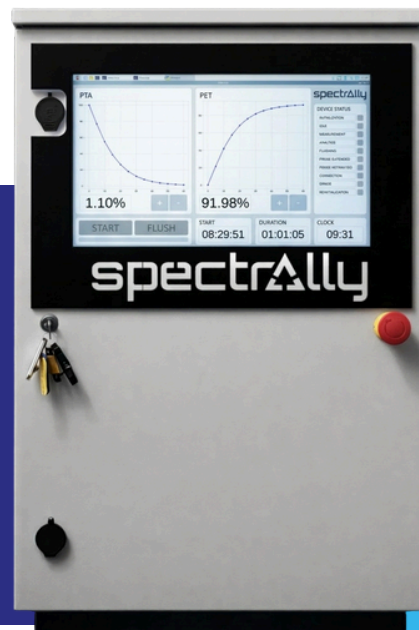


# Spectrally X1 INLINE

- Continuous measurement of reaction and composition
- Industrial communication (PROFIBUS, PROFINET)
- Advanced chemometric process models



Parameter	Value
Measurement principle	Raman spectroscopy
Laser wavelength	785 nm
Spectral range	300–1650 cm <sup>-1</sup>
Spectral resolution	8 cm <sup>-1</sup>
Laser power	600 mW (30 mW for ATEX applications)
Number of measurement channels	Up to 2 (expandable on request)
Acquisition time	5–300 s
Detector type	TE-cooled back-thinned CCD array
CCD camera cooling	Proprietary TEC driver with cooling module
Laser lifetime	Min. 2 years
Automatic calibration	Reference integrated in probe
Warm-up time	30 min
Operating temperature	0–45 °C
Storage temperature	–15 to +40 °C
Permissible relative humidity	20–70% RH (non-condensing)
Supply voltage	230 V AC, 50/60 Hz, with protective earth
Power consumption	300 W
Communication protocols	PROFIBUS, PROFINET, GSM
Operator panel (HMI)	Touchscreen display

# ELEVATING PROCESS EFFICIENCY

The Spectrally X1 INLINE Raman Analyzer combines advanced Raman spectroscopy with robust process monitoring capabilities. Designed for seamless integration into industrial environments, the system enables continuous monitoring of chemical composition directly in the process stream.

Together with Spectrally OS, the analyzer supports real-time concentration monitoring, multivariate model execution, and reliable process control.

Spectrally OS is designed to meet the demanding requirements of modern process environments. It provides centralized dashboards, real-time data visualization, system diagnostics, and flexible configuration tools, enabling process engineers to monitor, evaluate, and optimize production in real time.

## RELEASING THE POWER OF SPECTROSCOPY

Seamless data acquisition, chemometric model development, and advanced data processing are enabled by Spectrally OS, our advanced spectroscopy software platform.

Designed for process engineers, analytical teams, and production specialists Spectrally OS provides an intuitive and efficient environment with no-need spectral analysis, model management, and data interpretation.

