

# NIRS XDS Transmission OptiProbe Analyzer



Robust measuring system for reaction monitoring of liquids in the technical centers and pilot plants

The NIRS XDS Transmission OptiProbe Analyzer enables straightforward determination the content of aqueous products, clear liquids, solvents, and viscous samples. The analyzer is suited for use in the technical center as well as for atline applications in the scale-up of production processes.

NIRS disposable glass vials are available for viscous samples, limiting cleaning effort to a minimum. The optional NIRS XDS VialHeater can be used to analyze samples at a temperature of up to 200°C.

**The NIRS Transmission OptiProbe Analyzer is ideal for:**

- quickly analyzing aqueous products, clear liquids, solvents, and viscous samples without destroying them
- monitoring reactions in both the technical center and pilot plants
- developing methods as part of the scale-up of production processes



## User benefits

- Saves time – no need for sample preparation; provides analysis results in real-time
- Convenient – disposable glass vials optimize sample throughput
- Quick to implement, methods transferable to process analysis

## Key features

- Self-stabilizing NIRS XDS VialHeater with 9 positions (can be heated up to 200°C)
- NIRS disposable glass vials for analyzing viscous samples
- Network-compatible – central result and data management (client-server solution)
- Universal interface for quickly changing the measuring modules in just seconds

## Technical specifications

<b>Measuring mode</b>	Transmission
<b>Sample interface</b>	Direct analysis
<b>Wavelength range</b>	400–2,500 nm
<b>Measuring module</b>	Hot-swappable
<b>Detectors</b>	Silicon (400–1,100 nm), lead sulfide (1,100–2,500 nm)
<b>Data collection speed</b>	2 scans/s
<b>Data point interval</b>	0.5 nm
<b>Wavelength accuracy (currently recognized standard)</b>	< 0.08 nm
<b>Wavelength precision<sup>1</sup></b>	< 0.008 nm
<b>Wavelength precision<sup>2</sup> (instrument to instrument)</b>	< 0.025 nm
<b>Stray light</b>	< 0.1% at 2,300 nm
<b>Photometric linearity</b>	< 1% of the measured value
<b>Bandpass</b>	8.75 ± 0.10 nm
<b>Noise (RMS)</b>	
400–700 nm	< 80 micro AU
700–2,200 nm	< 30 micro AU
<b>Weight</b>	34.0 kg (74.0 lbs)
<b>Dimensions (W × H × D)</b>	455 × 346 × 559 mm (17.9" × 13.6" × 22")
<b>Operating temperature range</b>	4.5–35°C (40–95°F)
<b>Relative humidity</b>	10–90% RH, non-condensing

<sup>1</sup> based on a single analyzer

<sup>2</sup> based on a group of analyzers

# Ordering information

## 2.921.1520 NIRS XDS Transmission OptiProbe Analyzer

### Comprised of:

- 1.921.0010 NIRS XDS Monochromator
- 1.921.0520 NIRS XDS Transmission OptiProbe Module
- 6.740.0000 NIRS XDS accessory kit
- 6.743.0030 NIRS transmission pair calibration fixture
- 8.921.8007EN Manual for NIRS XDS Transmission OptiProbe

### Requires Vision Air software (select one of the following versions)

- 6.6072.208 Vision Air 2.0 Complete
- 6.6072.207 Vision Air 2.0 Network Complete
- 6.6072.209 Vision Air 2.0 Pharma Complete
- 6.6072.210 Vision Air 2.0 Pharma Network Complete

### Requires certified standards

- 6.7450.040 NIRS transmission wavelength calibration standard

### Optional certified standards (for the regulated environment)

- 6.7450.050 NIRS transmission standard, set of 6
- 6.7450.060 NIRS transmission wavelength verification standard

### Accessories

- 2.9219.010 NIRS XDS VialHeater
- 6.7402.000 NIRS disposable glass vials, 8 mm, 250 pcs.

[www.metrohm-nirs.com](http://www.metrohm-nirs.com)