

# Спектрофотометр Lightwave 3 и 3+

## Технические характеристики

По вопросам продаж и поддержки обращайтесь:

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## Lightwave 3 and 3+ Spectrophotometer

The Lightwave 3 and 3+ diode array spectrophotometers offer all the benefits associated with the established Lightwave range. Predefined methods for rapid scanning, kinetics, and concentration capabilities, a variable pathlength cell holder up to 40 mm and their compatibility with disposable low volume UV cuvettes have made them a common sight among educational and industrial laboratories alike.

### **Powerful and flexible**

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The instrument includes a large wide view display and in-built software providing flash scan, fixed wavelength measurements, kinetics and concentration with comprehensive graphics

capability plus the ability to store up to 90 methods. On peak confirmation is also a feature of the flexible software. Concentration may be measured using either a factor, single point calibration, multi-standard curves or alternatively there is a multi-wavelength mode where equations using absorbance values may be used for ratio calculations. Samples may be measured in 10, 20 or 40mm pathlength cells (glass, quartz or disposable).

## Flexible data export options

All instruments have a USB port to download result data to a flash drive in a CSV file format. Alternatively, results may be printed to an optional integrated graphical printer for a permanent record or exported via a USB cable connection to a suitable PC running Print Via Computer (PVC) software for advanced reporting and data storage or the optional wireless accessory.

TECHNICAL SPECIFICATIONS	
SPECIFICATION	DATA
Wavelength Range	190 to 1100 nm
Monochromator	Automatic upon switch on
Beam Height	15 mm
Spectral Bandwidth	5 nm or 3 nm for '+' models
Wavelength Accuracy	±2 nm
Wavelength Reproducibility	±1 nm
Light Source	Xenon flash lamp
Detector	Twin CMOS array
Photometric Range	-0.300 to 2.500 A, 0.3 to 100 %T
Photometric Linearity	±1.3 % or ±0.008 A whichever is greater at 546 nm

TECHNICAL SPECIFICATIONS	
SPECIFICATION	DATA
<b>Photometric Reproducibility</b>	±0.002 A to 0.5 A at 546 nm
<b>Stray Light</b>	<0.5 %T 340 nm
<b>Stability</b>	±0.01 A/h at 340 nm
<b>Noise</b>	±0.005 peak to peak ±0.002 RMS
<b>Digital Output</b>	USB flash drive, PC via PVC software, Optional Wireless
<b>Data Export</b>	USB flash drive: .tsv, native PVC format PC via PVC: .csv, .emf, .xlsx, .xls, .rtf, .tsv, native PVC format
<b>Method Storage</b>	90 with PIN number protection
<b>Graphical Display</b>	Color touch screen, zoom and track function
<b>Sample ID</b>	Yes
<b>Languages</b>	English, German, French, Spanish, Italian, Japanese, Chinese
<b>Dimensions</b>	260 × 390 × 100 mm
<b>Weight 3.00 kg</b>	3.00 kg

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### ^ Lightwave 3

ITEM #: 80-3007-42

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### ✓ Lightwave 3 with Printer

ITEM #: 80-3007-43

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### ✓ Lightwave 3 Wireless

ITEM #: 80-3007-44

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✓ **Lightwave 3 Wireless with Printer**

ITEM #: 80-3007-45

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✓ **Lightwave 3+**

ITEM #: 80-3007-47

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✓ **Lightwave 3+ with Printer**

ITEM #: 80-3007-48

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✓ **Lightwave 3+ Wireless**

ITEM #: 80-3007-49

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✓ **Lightwave 3+ Wireless with Printer**

ITEM #: 80-3007-50

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## Lightwave 3 & Lightwave 3+

### WPA Spectrophotometers

The Lightwave 3 and 3+ diode array spectrophotometers offer all the benefits associated with the established WPA Lightwave range. Predefined methods for rapid scanning, kinetics and concentration capabilities, a variable pathlength cell holder up to 40 mm and their compatibility with disposable low volume UV cuvettes have made them a common sight among educational and industrial laboratories alike.

#### Features & Benefits

- UV/Visible spectrophotometer covering 190 to 1100 nm allows you to see more of your sample
- Save data to a USB flash drive so results can be analysed later
- Builds on the success of the WPA Lightwave range
- PVC (Print Via Computer) software is included and allows you to transfer data directly from the instrument to your PC
- Optional integrated printer and wireless accessories

## Technical Specifications

Technical	
<b>Wavelength Range</b>	190 to 1100 nm
<b>Monochromator</b>	Flat grating
<b>Wavelength Calibration</b>	Automatic upon switch on
<b>Beam Height</b>	15 mm
<b>Spectral Bandwidth</b>	5 nm or 3 nm for '+' models
<b>Wavelength Accuracy</b>	±2 nm
<b>Wavelength Reproducibility</b>	±1 nm
<b>Light Sources</b>	Xenon flash lamp
<b>Detector</b>	Twin CMOS array
<b>Photometric Range</b>	-0.300 to 2.500 A, 0.3 to 199 %T
<b>Photometric Linearity</b>	±1.3 % or ±0.008 A whichever is greater at 546 nm
<b>Photometric Reproducibility</b>	±0.002 A to 0.5 A at 546 nm
<b>Stray Light</b>	<0.5 %T 340 nm
<b>Stability</b>	±0.01 A/h at 340 nm
<b>Noise</b>	±0.005 peak to peak ±0.002 RMS

## Technical Specifications

Software	
<b>Applications</b>	Single wavelength Multi wavelength Concentration Standard curve Wavelength scanning Kinetics Absorbance ratio
<b>Digital Output</b>	USB flash drive, PC via PVC software, Optional: Wireless
<b>Data Export</b>	USB flash drive: .tsv, native PVC format PC via PVC: .csv, .emf, .xlsx, .xls, .rtf, .tsv, native PVC format
<b>Method Storage</b>	90 with PIN number protection
<b>Graphical Display</b>	Yes, zoom and track function
<b>Sample ID</b>	Yes
<b>Languages</b>	English, German, French, Spanish, Italian, Japanese, Chinese
<b>Dimensions</b>	260 × 390 × 100 mm
<b>Weight</b>	3.00 kg

## Ordering Info

Order #	Product
80-3007-42	WPA Lightwave 3
80-3007-43	WPA Lightwave 3 with Printer
80-3007-44	WPA Lightwave 3 Wireless
80-3007-45	WPA Lightwave 3 Wireless with Printer
80-3007-47	WPA Lightwave 3+
80-3007-48	WPA Lightwave 3+ with Printer
80-3007-49	WPA Lightwave 3+ Wireless
80-3007-50	WPA Lightwave 3+ Wireless with Printer

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