



Be Right™



DR3900 Spectrophotometer with RFID technology

Product #: LPV440.99.00001

GBP Price: Available
Contact Us

Expert water analysis made simple.

Hach is committed to understanding your measurement needs in order to provide you and your lab with the right solution.

How do you currently ensure the accuracy of your current measurements? Are your laboratory testing procedures optimised to save time and ensure accuracy?

The DR3900 is designed to deliver accurate results quickly with Hach's innovative TNTplus and LCK reagents, which are optimised around:

- Sample preparation: reduced handling steps, precise dosing
- Sample analysis: automatic test recognition, expiration date check, etc.
- Utilisation of the new Truecal software to eliminate lot to lot variation
- Documentation of results: versatile data management

The DR3900 is a benchtop visible spectrum (320 - 1100 nm), split beam spectrophotometer with over 220 pre-programmed methods optimised for laboratory water analysis. With your daily routine of water analysis in mind, the DR3900 spectrophotometer is optimised for safe processes and accurate results. Control-parameters like Ammonium, COD, Phosphate, Nitrate and many others are easy to perform. The handling of tests and spectrophotometer is well designed to avoid any errors in your water analysis.

This instrument connects to Claros, Hach's innovative Water Intelligence System, enabling you to seamlessly connect and manage instruments, data, and process – anywhere, anytime. The result is greater confidence in your data and improved efficiency in your operations. To unlock the full potential of Claros, insist on Claros Enabled instruments.

Simple preparation

The boxes and cuvettes are colour-coded for fast and easy parameter and range recognition. Step-by-step illustrated test methods are printed on the box as quick reference or can be called up in the instrument menu.

The DR3900 spectrophotometer uses RFID technology to enable reliable communication with the sample taker and the samples. Simply hold the bottle lable in front of the RFID* sensor. When evaluating the cuvette test, use the tool bar on the touchscreen to assign the result to the sample.

Fast execution

The new 2D barcode details the batch number and the expiry date of the reagents. During the measurement process the DR3900 immediately picks up all the information on the cuvette by using the IBR+ barcode reader. If the expiry date has already passed, an automatic warning will be issued.

Method updates are also identified by the 2D barcode. The calibration data is incorporated in the RFID* tag on the box for hands-free update with the RFID module.

Comprehensive documentation

Measurement results are documented on the detailed level with timestamp, operator ID, absorbance reading, and calculated concentration. The 2D barcode delivers the lot number and expiry date, logged with every result. For your accreditation the certificate of analysis can be called up just by wiping the reagent box towards the RFID* sensor.

*RFID technology available in all EU countries plus e.g. Norway, Switzerland, Serbia, Macedonia, Turkey, Russia et al. For other countries please ask your local Hach contact person.

Customisable

With the ability to store hundreds of user-determined methods, operators are able to tailor the DR3900 to meet the everyday needs of the plant.

Being able to optimise and customise the method portfolio, combined with regular software updates and Claros connectivity, makes the DR3900 the ultimate solution to water quality lab needs.

Specifications

Beam Height:	10 mm
Cuvette compatibility:	Rectangular: 10, 20, 30, 50 mm, 1 inch; round: 13 mm, 1 inch
Data storage:	2000 measured values (Result, Date, Time, Sample ID, Operator ID)
Display:	7" TFT WVGA colour touchscreen
Enclosure waterproof rating:	IP30
IBR+:	Automatic test recognition, lot control and expiry date check
Interfaces:	USB type A (2), USB type B, Ethernet, RFID module
Light source:	Gas-filled Tungsten (visible)
LINK2SC:	Data exchange with SC1000 controller
Manual languages:	German, English, French, Italian, Spanish, Portuguese (PT), Czech, Danish, Dutch, Hungarian, Polish, Romanian, Russian, Slovenian, Swedish, Turkish, Greek, Finnish, Croatian, Bulgarian, Serbian, Slovakian
Max. operating humidity:	80 %
Max. Storage Humidity:	80 %
Operating conditions:	10 - 40 °C
Operating mode:	Transmittance (%), Absorbance and Concentration, Scanning
Optical system:	Reference beam, spectral
Photometric accuracy:	1 % at 0.50 - 2.0 Abs
Photometric linearity:	≤ 1 % at >2 Abs with neutral glass at 546 nm
Photometric measuring range:	± 3.0 Abs (wavelength range 340 - 900 nm)
Power requirements (Hz):	50/60 Hz
Power requirements (Voltage):	110 - 240 V AC
Power Supply:	Desk Power Supply
Power supply:	External power supply, 100 - 240 V, 50 - 60 Hz
Pre-programmed methods:	> 220
Printer compatibility:	Supports most office deskjet printers
Quality assurance:	Function to schedule and document QA with pass/fail indication
Region:	EU
Specific Technology:	RFID for easy method update, sample ID and Certificate of Analysis
Standard accessories:	None
Storage conditions:	-30 °C - 60 °C

Stray light:	< 0.1 % T at 340 nm with NaNO ₂
User interface:	Bulgarian, Chinese, Croatian, Czech, Danish, Dutch, English, Finnish, French, German, Greek, Hungarian, Italian, Japanese, Korean, Polish, Portuguese - Brazilian, Portuguese, Russian, Serbian, Slovakian, Slovenian, Spanish, Swedish, Turkish
User programmes:	100
Warranty:	2 years
Wavelength accuracy:	± 1.5 nm (wavelength range 340 - 900 nm)
Wavelength calibration:	Automatic
Wavelength range:	320 - 1100 nm
Wavelength reproducibility:	± 0.1 nm
Wavelength resolution:	1 nm
Wavelength selection:	Automatic
Weight:	4.2 kg

What's in the box

Includes: Spectrophotometer DR3900, adapter "A" for 1" round + Accuvac/1 cm rectangular cuvettes, manual in 5 languages (GB, D, F, I, E), power supply 100 - 240V, 47 - 63Hz, Operator RFID Tag.