

Diode array detectors

AZURA DAD 6.1L

The next generation of KNAUER DAD detectors begins with the new AZURA DAD 6.1L. It features a novel light path and flow cell architecture with improved handling and excellent performance. The frontal lamp and cell change ensures easy and secure maintenance. The temperature controlled optical bench minimizes signal drift. The wide flow cell selection allows the DAD 6.1L to be easily adapted to your needs.

An optional fiber optics adaptor offers the possibility to separate the flow cell spatially from the device and thus provides enhanced security for hazardous, explosive or toxic work processes.

The DAD 6.1L comes installed with a high brightness deuterium and a tungsten halogen lamp which cover a wavelength range from 190 to 1020 nm. This detector can be controlled with OpenLab® EZChrom and ClarityChrom® software, as well as from an optional touch display (stand-alone operation), via LAN or through analog input/output, allowing it to be integrated into almost any LC system.



Detection

Detector type	Diode array detector
Number of diodes	1024
Detection channels	8
Light source	high brightness deuterium (D2) lamp and halogen lamp with integrated GLP chip
Wavelength range	190 - 1020 nm
Spectral bandwidth	< 3.5 nm at H α line (FWHM)
Wavelength accuracy	\pm 1 nm
Wavelength verification	internal holmium filter and deuterium lines
Noise	\pm 3.5 μ AU at 254 nm
Drift	300 μ AU/h at 254 nm
Linearity	> 2.0 AU at 274 nm
Time constants	0.0 / 0.1 / 0.2 / 0.5 / 1.0 / 2.0 / 5.0 / 10.0 s
Flow cell	not included (see Accessories / Spare parts)
Integration time	automatic

Communication

Maximum data rate	100 Hz (LAN)
Inputs	Error (IN), Start (IN), Autozero
Outputs	Events 1 - 2, Error (OUT), + 5 V, Valve + 24 V, Valve (OUT)
Analog outputs	4 x 0 - 5 V, 16 bit
Control	digital: LAN-DHCP, remote connector manual: control unit (optional)
Programming	wake up

Technical parameters

GLP	detailed report including lamp recognition, operating hours, lamp operating hours, number of lamp ignitions
Display	optional control unit
Ambient conditions	temperature range: 4 - 40 °C, 39.2 - 104 °F humidity: below 90 % noncondensing

General

Power supply	100 – 240 V, 50 – 60 Hz, 75 W
Dimensions	361 x 158 x 523 mm (W x H x D)
Weight	13.8 kg
Leak sensor	yes

Ordering details:

ADC11	AZURA DAD 6.1L, Diode array detector 190-1020 nm
AMC19	KNAUER LightGuide flow cell cartridge, 10 mm path length, 1/16", 2 μ l volume, biocompatible,
AMD59	KNAUER LightGuide flow cell cartridge, 50 mm path length, 1/16", 6 μ l volume, biocompatible
AMC38	KNAUER flow cell cartridge, 10 mm path length, 1/16", 10 μ l volume, stainless steel
AMB18	KNAUER flow cell cartridge, 3 mm path length, 1/16", 2 μ l volume, stainless steel
AZL01	D2 lamp for DAD 6.1L
AZL02	Halogen lamp for DAD 6.1L
AMKX8	Fiber optics adapter for DAD 6.1L
AMLX8	Test cell for DAD 6.1L