

ECP2010

ANALYTICAL HPLC PUMP

This pump works as **isocratic** pump and together with **Gradient Box with Degasser ECB2004** also as **gradient** pump.

Gradient Box with Degasser ECB2004 is equipped with four way gradient mixing valve and degasser and is ordered separately.

With a flow-rate of **0.01-10.00 ml/min.** and a pressure limit at **40 MPa** is this pump suited for **analytical** applications in liquid chromatography. It is designed with main and auxiliary pump heads connected in series with a piston diameter of 1/8".

New sophisticated unit allows achieving a precise **low-pressure gradient**, i.e. gradual changes of solvent composition by mixing **up to four liquids** at the pump's entry. It is also possible to predefine percentage of composition when using the pump in isocratic mode. The gradient profile can be defined from a computer.



There are many improvements which make pump more reliable, safe and precise. Also maintenance is now easier. E.g. pistons exchange is easier because of new construction; new learning algorithm for **pulsation suppression**; leakage sensor etc.

When necessary, it is possible to use **back washing of pistons** (e.g. when using buffered mobile phase).

Pump is supported by **ECOMAC** and **Clarity** software.

SPECIFICATION

TECHNICAL PARAMETERS

Flow-rate	0.01 – 10.00 ml/min.
Pumping system	two plungers dia. 1/8" connected in series
Maximum operating pressure	40 MPa (5800 PSI, 400 bar)
Accuracy of flow-rate (1ml/min. 12MPa H ₂ O)	± 2%
Repeatability of flow-rate (1ml/min. 12MPa H ₂ O)	± 0.5%
Accuracy of pressure measurement	± 2%
Adjustable lower pressure limit	0.0 – 39.0 MPa
Adjustable upper pressure limit	1.0 – 40.0 MPa
Number of valves*	4 (A,B,C,D)
Setting of components concentrations*	0.0 – 100.0 %
Wetted materials	stainless steel, sapphire, KEL-F, seals**
Communication	RS232, Ethernet(LAN), USB
Display, keypad	VFD 140x32 pixels, 10 pushbuttons
Power supply	100-240V 50/60Hz 100VA
Dimensions (w x h x d)	280 x 135 x 498 mm
Weight	10 kg

* gradient functions are available only together with **Gradient Box with Degasser ECB2004**

** seals material: default is GFP (PTFE), optional is UHMW-PE, more information on request