KD Scientific Legato 210 Syringe Pump

KD Scientific | KDS-LEGATO

The KD Scientific Legato 210 is a high-performance dual-syringe infusion and withdrawal pump delivering ±0.35% accuracy across a flow range from 3 pl/min to over 215 ml/min, compatible with any syringe from 0.5 µl to 140 ml.

SPECIFICATIONS

Flow accuracy	±0.35%
Reproducibility	±0.05%
Min flow rate	3.06 pl/min (0.5 µl syringe)
Max flow rate	215.8 ml/min (140 ml syringe)
Syringe range	0.5 µl to 140 ml (any brand)
No. of syringes	1 or 2 simultaneously
Linear force	34 kg (75 lb)
Programs (210P)	40 programs × 20 steps (800 steps total)
Display	4.3-inch WQVGA TFT colour touchscreen
Interfaces	RS232 (9-pin D-Sub), RS485, USB Type B, I/O & TTL (15-pin)
Dimensions	16.5 × 25.4 × 27.9 cm (W × D × H)
Weight	4.9 kg
Power	100–240 VAC, 50/60 Hz, 50 W
Certifications	CE, UL, CSA, CB Scheme, EU RoHS

FEATURES

- Dual-syringe operation (1 or 2 syringes simultaneously)
- Operating modes: infuse-only, withdraw-only, infuse/withdraw, withdraw/infuse, continuous
- Flow range: 3.06 pl/min to 215.8 ml/min
- Flow accuracy: ±0.35%; reproducibility ±0.05%
- 1.8° stepper motor with 1/16 microstepping (6,400 microsteps/revolution)
- Linear force: 34 kg (75 lb) maximum
- Legato 210P: 40 programs × 20 steps = 800 stored program steps
- Built-in syringe database (any brand, 0.5 µl to 140 ml)
- 4.3-inch WQVGA TFT colour touchscreen with touch pad lock
- RS232 (9-pin D-Sub), RS485, USB Type B, and 15-pin I/O & TTL interfaces
- Analog control variant (210AC): 0–10 VDC input
- Universal power supply: 100–240 VAC, 50/60 Hz
- Non-volatile memory, real-time clock, stall detection
- Integrated spill dam; horizontal or vertical orientation
- CE, UL, CSA, CB Scheme, EU RoHS certified

APPLICATIONS

- Stereotaxic injections and in vivo micro-infusion (neuroscience)
- Pharmacokinetics and ADME dosing studies
- Microfluidics and nanofluidics
- Electrospinning (polymer solution feed rate control)
- Direct infusion mass spectrometry (ESI-MS)
- Flow cytometry sample and sheath fluid delivery
- Organ and tissue perfusion
- Drug discovery compound delivery
- Calibration and standards delivery
- Organic synthesis reagent addition