

MASTERFLEX[®]

L/S[®] PRECISION PERISTALTIC PUMP SYSTEMS

PRECISE SPEED CONTROL WITH A WIDE RANGE OF APPLICATIONS

These precision pumps provide precise resetting of speed control and the option of controlling the pump flow from a remote signal. Use in a broad range of critical applications—from agriculture to chemical processing; and from chemical feed to filtration. They are designed to handle a wide range of fluids from the highest purity to extremely caustic solutions.

FEATURES AND BENEFITS

Easy to Use

- Intuitive control keypad uses common control symbols to indicate functions
- Accurate, reliable control of flow - digital display of RPM for accurate control
- Universal voltage – operate anywhere in the world. Unit accepts power cord set with IEC320 plug to adapt to local electricity
- Pump system interfaces directly with plant controls and allows remote control of flow, start/stop, remote/local condition, and flow direction control
- Quick start guide included for faster set-up

Easy to Maintain

- Low maintenance with minimum downtime — change tubing in less than 30 seconds
- Splash-resistant front panel
- Separate start/stop control allows you to maintain your flow setting when powering down



L/S Precision
Digital Peristaltic
Pump System

Diverse Performance Range

- Deliver flow rates from 0.06 to 3400 mL/ min with Masterflex L/S pump heads
- Cartridge pump flow rates: 0.001 to 1700 mL/min
- Choose from three speed ranges for optimum control
- $\pm 0.25\%$ speed control for greater accuracy
- Interface with other instrumentation via remote control capability

Ergonomic Design

- Portable - motor and controller in one convenient package
- Molded handle for easy one-handed portability
- Space efficient - stackable design with a small footprint

Flow rates in mL/min (flow rates in parentheses can only be obtained with the High-Performance Pump Head)

RPM	Precision pump tubing						High-performance precision pump tubing			
	L/S 13	L/S 14	L/S 16	L/S 25	L/S 17	L/S 18	L/S 15	L/S 24	L/S 35	L/S 36
	Easy-Load II						Easy-Load II and High-Performance			
6 to 600	0.36 to 36	1.3 to 130	4.8 to 480	10 to 1000	17 to 1700	23 to 2300	10 to 1000 (11 to 1100)	17 to 1700 (18 to 1800)	23 to 2300 (26 to 2600)	29 to 2900 (34 to 3400)
3 to 300	0.18 to 18	0.65 to 65	2.4 to 240	5 to 500	8.5 to 850	12 to 1150	5 to 500 (6 to 550)	8.5 to 850 (9 to 900)	12 to 1150 (13 to 1300)	15 to 1450 (17 to 1700)
1 to 100	0.06 to 6	0.21 to 21	0.8 to 80	1.7 to 170	2.8 to 280	3.8 to 380	1.7 to 170 (1.8 to 180)	2.8 to 280 (3.0 to 300)	3.8 to 380 (4.3 to 430)	4.8 to 480 (5.8 to 580)

Note: Flow rates were determined using water at room temperature and with zero back pressure and zero suction lift. Higher flow rates in parentheses can be obtained only with High-Performance pump head.

CATALOG NUMBER			
Pump System with Easy-Load II (Thin Wall)	MK-77712-36	MK-77712-32	MK-77712-28
Pump System with Easy-Load II (Thick Wall)	MK-77712-37	MK-77712-33	MK-77712-29
Pump System with High-Performance Pump	MK-77712-38	MK-77712-34	MK-77712-30
PERFORMANCE			
Max number of pump heads	2	2	4
Flow Capacity (mL/min)	0.36 to 3400	0.18 to 1700	0.06 to 580
RPM	6 to 600	3 to 300	1 to 100
Reversible	Yes		
External Control - Input	4-20 mA; 0 – 10 V; Remote / Local; Dir (CW/CCW); Start/Stop		
ELECTRICAL SPECIFICATIONS			
Voltage (AC) 60/50 (Hz)	Universal input 90 to 260 VAC 60/50 (Hz)		
Current	2.2A @115V; 1.1A@230V		
Motor Type	PMDC		
Motor Size	1/10 HP (75W)		
Control Type	PWM (Pulse Width Modulated)		
Display (rpm)	Seven-segment, 3-digit, Blue LED, 1 RPM resolution (0.1 RPM for 1 to 100 RPM Range)		
Speed regulation (accuracy)	± 0.25%		
PHYSICAL SPECIFICATIONS			
Materials of construction	Powder-coated aluminum and ABS Plastic		
IP rating	IP33		
Agency approvals	ETL, cETL, CE, RoHS		
Operating temperature	0°C to 40°C		
Storage Temperature	– 25°C to 65°C		
Dimensions (L x W X H)	26.7 x 20.3 x 20.3 (cm) 10.5 x 8 x 8 (in)		
Shipping Weight	9.2 kg / 20.2 lb (6.8 kg / 15.0 lb - drive only)		

Configurations Offered

- Available in three standard bundles packages with Easy-Load II or High-Performance Pumps

Accessories

MK-07595-47 Cable assembly, DB9 male connector and 7.9-m (25-ft) cable with stripped wire terminal ends. Use for remote control.

MK-77595-35 Foot switch, DB9 male, with 1.8-m (6-ft) cable.

For more information:

800-637-3739 or 847-381-7050

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