

Series MD Electric Pump



PUMP CATEGORY

Type: Multiple Elastomer Diaphragm
Control: Motor Speed

FLOW RATE

3 - 2,190 USG/H (11.36 - 8,290.1 L/H)

PRESSURE

0 - 2,500 PSIG (0 - 172.4 BARG)

SUPERIOR DESIGN

- Durable, High-Quality Materials
- Accurate and Repeatable Injection
- Quick Maintenance and Low Downtime
- High Return on Investment
- Nearly Pulse-Free Flow
- Particulate Tolerant
- Zero Leakage

CHEMICAL RESISTANCE

Proprietary, high-quality seal materials enable CheckPoint pumps to provide unparalleled chemical resistance. Wetted components are available in an array of materials. Chemical applications include, but are not limited to:

- Scavengers (H₂S, O₂, CO₂)
- Hydrate Inhibitors (MeOH, MEG, LDHI)
- Foamers and Defoamers
- Corrosion, Scale, and Paraffin Inhibitors
- Clarifiers, Biocides, Bleaches, and Acids

MD MODEL	FLOW RATE (MINIMUM) USG/H (L/H)	FLOW RATE (MAXIMUM) USG/H (L/H)	WORKING PRESSURE (MAXIMUM) PSIG (BARG)	DRIVE MECHANISM	PUMP ONLY DIMENSIONS L X W X H IN (MM)	PUMP ONLY WEIGHT LB (KG)	SUCTION CONNECTION	DISCHARGE CONNECTION
MDA	3 (11.4)	180 (681.4)	1,200 (82.7)	Cam Shaft	9.92 (252) x 10.1 (256.5) x 7.5 (190.5)	28 (12.7)	1/2" NPT	3/8" NPT
MDB	10.8 (40.9)	180 (681.4)	2,500 (172.4)	Cam Shaft	9.93 (252.2) x 10.38 (263.7) x 8.71 (221.2)	37 (16.8)	1/2" NPT	1/2" NPT
MDC	2.4 (9.1)	480 (1,817)	1,000 (68.9)	Wobble Plate	11.2 (284.5) x 7.3 (185.4) x 9.5 (241.3)	48 (21.7)	1" NPT	3/4" NPT
MDD	80.4 (304.3)	804 (3,043.5)	2,500 (172.4)	Wobble Plate	16.0 (406.4) x 10.0 (254) x 12.42 (315.5)	145 (66)	1-1/4" NPT	3/4" NPT
MDE	72 (272.5)	1,200 (4,542.5)	1,000 (68.9)	Wobble Plate	17.01 (432.1) x 9.44 (239.8) x 10.34 (262.6)	125 (56.8)	1-1/2" NPT	1" NPT
MDF	21 (79.5)	2,190 (8,290.1)	1,100 (75.8)	Wobble Plate	17.01 (432.1) x 9.44 (239.8) x 10.34 (262.6)	240 (109)	2-1/2" NPT	1-1/4" NPT

Tabular data should be used for quick reference only. See performance curves for accurate pump selection. This tabular data represents the metallic head configuration. Non-metallic head data available upon request. Contact CheckPoint for additional data.





CheckPoint's **Series MD** pump delivers up to 2,190 USG/H (8,290.1 L/H) and can reliably inject into pressures up to 2,500 PSIG (172.4 BARG). The Series MD features hydraulically actuated balanced diaphragms, with each containing an internal suction and discharge check. Each diaphragm is sequentially actuated by a cam shaft or wobble plate design, delivering up to 90 discharge cycles per second. The Series MD has low-mass poppet check valves, and none of its sliding parts ever come into contact with the chemical. These features allow particles to pass through the pump without causing damage, guaranteeing long-term reliability and superior uptime. Further, most models may also be equipped with a diaphragm vacuum safety (DVS) enhancement. This offers additional protection against diaphragm rupture in any condition that results in excess vacuum on the pump inlet. The flow rate is controlled by varying the speed of the motor with a variable-frequency drive (VFD). Any changes can be easily implemented while the unit is running, either locally at the device or remotely using a 4-20mA signal. The Series MD can accommodate a variety of motors, ensuring compliance to any stringent electrical requirements. Every aspect of the construction of this pump ensures high stability, low downtime, and the immense dependability that CheckPoint consistently guarantees.

Our pumps maintain unparalleled chemical resistance due to the essential integration of high-quality, proprietary seal materials. In order to meet a wide variety of chemical compatibility needs, wetted parts are available in an array of materials, such as 316 SS, Hastelloy C-276, Duplex 2205, Super Duplex 2507, brass, Kynar, and Polypropylene, and seals are available in EPDM, Viton-XT, Teflon, Neoprene, and Buna-NXS.

We recommend "Plug & Play" injection packages (as pictured below) as an optimum solution to efficiently and effectively integrate chemical injection into your process. CheckPoint has engineered, manufactured, and sourced high-quality components which, combined in a package with our pumps, maximize product life and optimize productivity. We also offer custom system design and technical services to meet specialty product requirements. CheckPoint will create a solution that meets your specific chemical injection needs, from concept to completion.

