

WARRENDER, Ltd. Newsletter

Thermoplastic Seal-less Mag-Drive Pumps

Attn: Seal-Less Pump Users
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PROMAG Molded Thermoplastic Series "M" Refinements

PROMAG molded thermoplastic centrifugal pumps are available in a complete range of sizes from 1/6 to 5 HP with wide hydraulic coverage. The most significant development involves increased performance by means of higher torque, dual neodymium magnetic couplings for accommodating larger impeller sizes, higher specific gravities and larger HP motors.

Other improvements include a larger 2" suction port (vs. 1-1/2") on the M7.5 for high flow stability and lower NPSH requirements.



PROMAG Pump Family

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WARRENDER Brand Name & Website Links

WARRENDER, LTD. website is nearly complete with technical documents available for virtually all of our pump designs, for more details please visit: www.warrender.com.



Competition

PROMAG

PROMAG Models for Retrofitting March or Little Giant

The following sizes have the same centerline and casing port configuration. PROMAG uses standard NEMA motors vs. proprietary soft-starting motors.

MATERIAL	PROMAG	MARCH	LITTLE GIANT
PP	M6.0H1APT13	TE-6R-MD	TE-6-MD-HC (Ryton)
PVDF	M6.0H1AVT13	TE-6K-MD	TE-6-MD-CK
PP	M7.0H1APT13	TE-7R-MD	TE-7-MD-HC (Ryton)
PVDF	M7.0H1AVT13	TE-7K-MD	TE-7-MD-CK
316-SS	ST6.0H3ASTT3	TE-6S-MD	n/a
316-SS	ST7.0H3ASTT3	TE-7S-MD	n/a

NOTE: Competitive larger models designed with male threaded suction port connections have excessive NPSH requirements due to dissimilar piping and suction intake I.D.

PROMAG Technical Advantages

PROMAG

Standard NEMA motors
 High torque, dual neodymium magnets
 Oversized casing wear ring & shaft
 Modular / interchangeable impellers

MARCH or LITTLE GIANT

Proprietary soft starting motors
 Low torque magnets
 Minimal thrust ring & shaft
 One-piece impeller magnet

Thermoplastic mag-drive turbine pumps can be used for corrosive applications.



WARRENDER Machined Thermoplastic Series MCH, MT MC-SP & MT-SP

As found in the latest PROMAG pumps, the latest generation of MCH, MT, MC-SP and MT-SP feature the higher torque, dual neodymium magnetic couplings matching the torque requirements with larger impeller sizes, higher specific gravities and larger HP motors. Also, the external magnets have a slip fit with no need for heat expansion or special tools.

For example, the MCH pumps are now available with the largest "0" impeller for meeting higher head and/or flow hydraulic conditions.

The MT design is offered in full polypropylene (PP), including the impeller, for unique chemistries.



The pumps are machined from solid blocks of plastic

WARRENDER Power Monitoring Applications Guide

The September issue of **Pumps & Systems** contains a **Feature Article** on power monitors written and submitted by WARRENDER, LTD.

One important aspect of this article involves the need for operators and providers alike to verify operating conditions by means of pressure or flow readings to ensure that pumps are operating on the curve near the design point.



The high load trip sensor will detect:

- Excessive Flow or Run-out
- Cavitation
- Vortexing
- Obstructed suction line

The low load trip sensor will detect:

- Throttled or Closed Discharge Valve
- Dry-run
- Dirty Filter Elements