

AQUA-LATOR™ DIRECT DRIVE MIXERS





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Whatever your floating mixer requirements, there is an Aqua-LatorTM Direct Drive Mixer (DDM) to meet your needs. Evoqua Water Technologies offers the widest range of ratings and materials of any mixer manufacturer. These choices provide the most cost-effective design for municipal, pulp and paper, food processing or other types of industrial wastewater treatment. Whichever, Aqua-Lator DDM you choose, be assured that you have selected the best mixer on the market today. In terms of design, craftsmanship, performance and versatility it is the best investment that you can make.

MATERIALS OF CONSTRUCTION

	SF Series	SS Series
Motor Shaft	One-piece 17-4 PH stainless steel	One-piece 17-4 PH stainless steel
Propeller	316 stainless steel	316 stainless steel
Motor Base Assembly	304 stainless steel	304 stainless steel
Discharge Volute Assembly	304 stainless steel	304 stainless steel
Float Core	304 stainless steel	304 stainless steel
Float	14-gauge, 304 stainless steel shell, filled with closed cell polyurethane foam	Fiberglass reinforced polyester shell, filled with closed-cell polyurethane foam

DESIGN FEATURES

Motor

- Totally enclosed, fan-cooled
- Rated severe chemical duty
- Class F insulation
- Double-row bearings on drive end
- Heavy duty L-10, 100,000 hour bearings
- Heavy duty seals
- Largest diameter shafts
- Stainless steel hardware
- Service factor of 1.15
- Designed to meet the most demanding operational requirements

Motor Module

- One-piece 17-4 PH stainless steel shaft
- Shaft threaded and keyed on drive end
- 135,000-PSI shaft yield strength
- Dynamically balanced
- Hydraulically balanced
- Optimized motor module design minimizes vibration







Motor Base Assembly

- 304 stainless steel or epoxy coated steel
- Interlocking debris deflection in lower portion of assembly
- Alignment of motor controlled by machined index
- Double engagement of the debris deflector provides protection of the motor windings and bearings when the motor is reversed.
- Deflector bearing located at end of motor base
- Shaft runs free under normal operating conditions
- Proprietary seal design

Propeller

- Precision investment casting
- 316 stainless steel
- Dynamically balance
- Keyed to mate to motor shaft
- Secured by stainless steel locking nut
- Simple installation or removal
- Anti-fouling, non-cavitating for greater operational efficiency



Float

- Largest one-piece floats available
- Fiberglass reinforced plastic or 14-gauge, 304 stainless steel
- Engineered to provide stability
- Filled with closed-cell polyurethane foam that adds stability and prevents the possibility of sinking if damage occurs to the float exterior

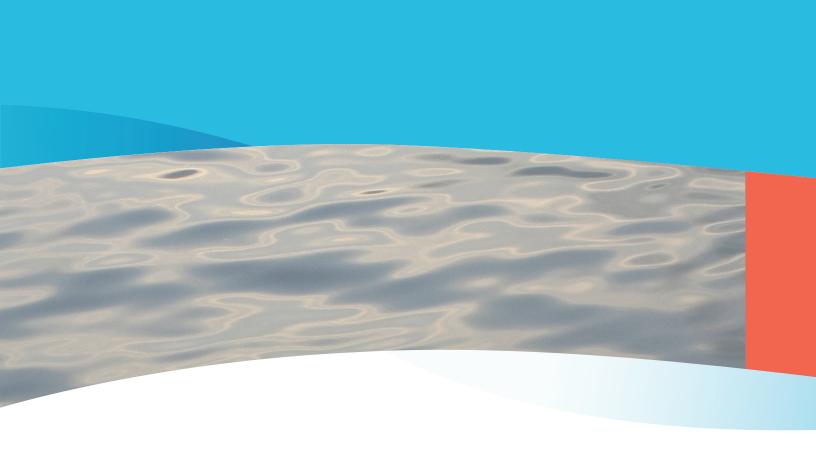
Discharge Volute Assembly

- 304 stainless steel
- Reinforced with gussets to maintain dimensional integrity
- Volute is transitioned to retain more velocity of the fluid for improved performance
- Advanced hydraulic features maximize mixer efficiency

Since establishing a leadership position in the high speed floating mechanical aerator market, the Aqua-Lator™ Direct Drive Mixer delivers reliable performance, simplicity of operation and is easy to maintain. The Aqua-Lator DDM has exceptional versatility and can be installed in a wide range of wastewater treatment applications.









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