

ProcessMaster

The **ProcessMaster** is the most energy efficient and flexible multi purpose mixer on the market:

- Low energy consumption/high efficiency
- High shear rate
- High mixing rate
- Fast and easy installation
- Low service cost - few wear parts
- Hygienic design in compliance with EHEDG
- Step-file available on inquiry

The **ProcessMaster** is developed for products with medium to high viscosities and is designed with a directly driven high shear mixer at the bottom and top mounted agitator.



APPLICATIONS

The **ProcessMaster** (patent pending) represents the next generation of mixing solutions for the process industry.

Not only is it more compact and perfectly optimized for energy-efficient high shear mixing, it is also virtually maintenance-free.

By means of vacuum, the powder is drawn from the funnel into the mixer below liquid level and instantly wetted. The powerful, high shear mixer and scraper agitator generates a controlled vortex in the tank. The combination of vortex and vacuum effectively separates air from the liquid and generates a perfect homogenous dispersion within seconds.

The unit comes with an insulated jacket for quick heating and cooling with steam or ice water. For extra quick heating the unit can be equipped with direct steam valves. For Extra fast cooling flash cooling down to 15° C can be quoted as an option.

The result is a highly stable and homogenous, air and lump-free end product.

APPLICATIONS:

The **BasicMaster** is used for mixing of sauce, mayonnaise (max. 1000 kg) dressing, gels, cream, emulsion, etc.

Homogenization down to 2 my lump free and viscosity up to 50.000 cP.

STANDARD EQUIPMENT:

Mixer unit (WEG) with flushed mechanical shaft seal (requires frequency control)
Vacuum pump with water-saving unit (requires frequency control)
Insulated Steam/cooling jacket flange connection
Scraper agitator with SEW gear (incl. inverter)
3-way valve for CIP of vacuum pipe
Manhole with safety sensor
Inspection glass with wiper / inspection glass with LED light source (Lumiglas)
2 x powder valves with Alfa Laval LKLA actuator (butterfly)
1 x outlet valve with Alfa Laval LKLA actuator (butterfly)
2 x rotating spray balls with 3-way valve from vacuum pipe (Alfa Laval Uniq type 21)
2 x level sensors top & bottom (IFM)
Temperature transmitter (IFM)
Pressure sensor (IFM)
Fittings: TRI-Clams, SMS or DIN-ISO

OPTIONS

Steam/cooling jacket with insulation
Valve battery for cooling and heating
Direct steam valves with 5my ultra filter +valves
Powder funnels (100l, 250l, 500l, 1000l & 2000l)
Powder funnel (25l) for small ingredients incl. manual butterfly valve
Flash Cooling
Extra powder valve 2½" butterfly / extra liquid top inlet/ sample valve
MCC panel with inverters
I/O Panel for connection to master PLC
Outlet pump (Alfa laval SRU Positiv pump)
Load cells (2 pc global weighing) with transmitter in stainless box
Process valve - different type (GEA, SPX, etc.)

TECHNICAL DATA

Model:	Mixer size	Steam Jacket	Direct steam	Cooling Water	Mixer effect:	Vacuum pump	Agitator
250 HVA	160	300 kg/h	300 kg/h (1)	10 m³/h	18,5 kW	3 kW	1.5 kW
500 HVA	160	400 kg/h	300 kg/h (1)	10 m³/h	22,5 kW	3 kW	1.5 kW
1000 HVA	200	500 kg/h	600 kg/h (2)	15 m³/h	30 kW	5.5 kW	3 kW
2000 HVA	250	600 kg/h	600 kg/h (2)	15 m³/h	55 kW	5.5 kW	3 kW
3000 HVA	325	800 kg/h	900 kg/h (3)	20 m³/h	75 kW	7.5 kW	5.5 kW
5000 HVA	325	1000 kg/h	1200 kg/h (4)	20 m³/h	90 kW	7.5 kW	7.5 kW

Model:	Outlet/U	Powder valve	CIP	Inlet	Service Water	Dimensions (H x W x D)	Shipping weight	Shipping volume
250 HVA	Ø51/650mm	1 x Ø51 1 x Ø63,5	Ø51	1x Ø51	100 L/h	2400 x 1300 x 1000 mm	600 kg	3.1 m³
500 HVA	Ø51/650mm	1 x Ø51 1 x Ø63,5	Ø51	1x Ø51	100 L/h	2600 x 1400 x 1100 mm	900 kg	4.0 m³
1000 HVA	Ø63,5/650mm	1 x Ø51 1 x Ø63,5	Ø51	1x Ø51	100 L/h	3600 x 1500 x 1300 mm	1400 kg	7.0 m³
2000 HVA	Ø63,5/1000mm	2 x Ø63.5	Ø51	2x Ø51	100 L/h	4000 x 2100 x 1800 mm	1800 kg	15 m³
3000 HVA	Ø76/1200mm	2 x Ø63.5	Ø51	2x Ø51	150 L/h	4500 x 2600 x 2100 mm	2200 kg	24.5 m³
5000 HVA	Ø76/1200mm	2 x Ø63.5	Ø51	2x Ø51	150 L/h	4800 x 2700 x 2300 mm	2300 kg	30 m³