

INNOTEG-ScienceOne Product Catalog



INNOTEG-ScienceOne Rotary Evaporator — Vap Series

>>> High precision and easy to use

Vap Series Rotary Evaporators include Vap Basic and Vap Smart

Our Vap Series is designed for standard distillation, crystallization, concentration, powder drying and separation of one or more solvents. It can also be used for pretreatment of samples before gas chromatography, liquid chromatography, and mass spectrometry!

Vap Basic

>> Efficient and economic choice

The Vap Basic rotary evaporator come equipped with an easy to use semi-manual lift with integrated safety lift out function, and it is ideal for all standard evaporating applications. Digital displays for both rotation speed and heating bath temperature allow for optimal controlling of all distillation processes.



Features

- > Rotation Speed: 5-300 rpm
- $\,^{>}$ Temperature range, heating bath: RT to +180 °C, suitable for water / oil bath application.
- > The design of the heating bath, wide top & narrow bottom, is beneficial to the rapid heating of heating medium and shortening the heating time.
- > The key lock function of operation panel can prevent the unpredictable touch.
- > The 3-layers condensing coil design can enhance the distillation efficiency.
- > The hand grip is ergonomically designed and located in front of the instrument, it can be moved up and down easily to control the evaporation flask. The ambidextrous design makes working more convenient and comfortable by either left or right hand.
- > After an unexpected power failure, the instrument will raise the evaporating flask automatically to avoid damage to the sample.
- > Adjustable immersion angle of height of evaporating flask.

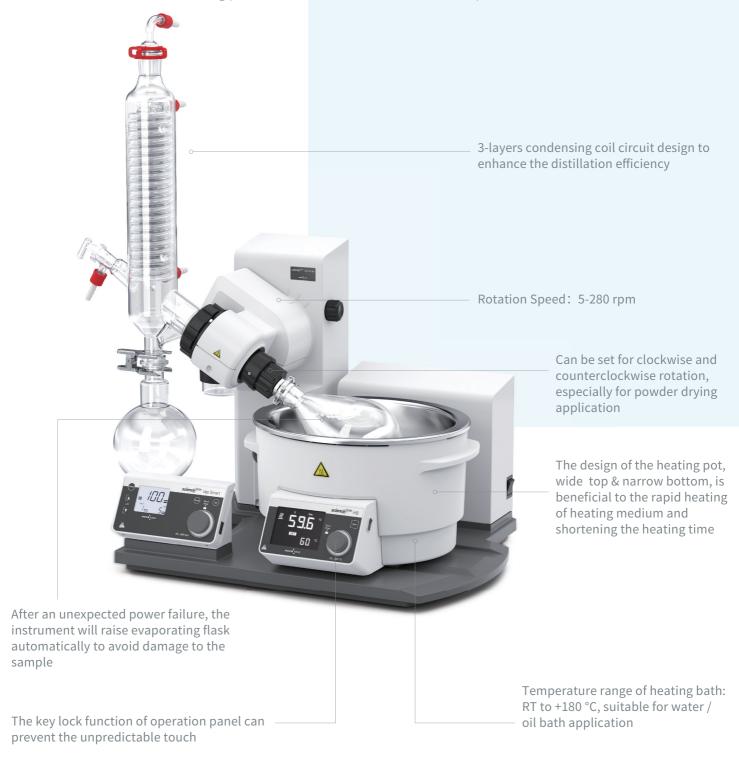
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Vap Smart

>> Advance and precise distillation

The Vap Smart rotary evaporator with advanced technology.

The automatic solvent boiling point detection make the distillation process much easier.



Technical Specifications — Rotary Evaporators



Adjustable immersion height and angle



Push-out function



High efficiency condensing tube, 3-layers condensing coil increases condensing surface



Advanced heating bath, temperature from RT to +180 °C

FECHNICAL DATA	Vap Basic	Vap Smart	
Drive			
Type of condenser	V	vertical	
Condensing surface		1500 cm ²	
Rotation Speed	5 rpm - 300 rpm	5 rpm - 280 rpm	
Clockwise and counterclockwise	no	yes	
Lifting	manual	motor	
Stroke displacement	120 mm	140 mm	
Heating Bath			
Temperature range	RT to	RT to + 180 °C	
Heating power	1	1300 W	
Temperature accuracy		±1 K	
Operation mode	3	3 mode	
Maximum heating bath capacity		4 L	
Vacuum controller	0	optional	
Timer	no	yes	
Dimensions (W*D*H)	510 x 345 x 490 mm	500 x 430 x 410 mm	
Weight	15.5 kg	20 kg	
Permissible ambient temperature	+ 5 °C	+ 5 °C to + 40 °C	
Permissible relative humidity		80%	
Protection class according to DIN EN 60529		IP 20	
RS 232 interface	no	yes	
Power consumption	1	1400 W	
Voltage		220 - 230	
Frequency	50	50/60 Hz	

Accessories

>>> Rotary Evaporators



INNOTEG-ScienceOne Vap Basic



INNOTEG-ScienceOne Vap Smart



INNOTEG TCS-3 Refrigerated Circulator

INNOTEG-ScienceOne Magnetic Stirrer — MR Series

>>> High speed and precise temperature control

MR series magnetic stirrers include MR 1 and MR 5

Our MR series magnetic stirrer is suitable for liquid or solid-liquid mixture. It can be stirred or heated/stirred at the same time to provide strong mixing and precise temperature control!

INNOTEG-ScienceOne MR1



Features

- > Heating power: 600 W
- > Temperature range: RT to + 310°C
- > Rotation speed: 50-1500 rpm
- Real-time measurement of the viscosity trends,
 easy to observe the experimental progress
- Stirring direction clockwise / counterclockwise alternatively, especially for crystallization experiment
- Intermittent operation mode can be set to satisfied the special mixing requirements

INNOTEG-ScienceOne MR 5

>> High power and high chemical resistance

The heating plate is made of aluminum alloy with ceramic coating, which combines chemical resistance, and excellent heat conduction and distribution



Intermittent operation mode can be set to satisfy the special mixing requirements

Technical Specification — Magnetic Stirrers

TECHNICAL DATA	MR 1	MR 5	
General data			
Voltage	220 – 230 VAC \pm 10 %		
	115 VA	C ± 10 %	
	100 VA	100 VAC \pm 10 $\%$	
Frequency	50 /	60 Hz	
Power input	650 W	900 W	
Power input standby	1.	6 W	
Self-heating of the heating plate by max. stirring	+1	.3 °C	
(RT:22° C/duration:1h)			
Automatic reverse rotation		/es	
Intermittent mode		/es	
Viscosity trend measurement	yes		
Timer		yes	
Interface	USB,	USB, RS 232	
Permissible ambient temperature	+5	+5+40°C	
Permissible relative humidity	8	80 %	
Protection class according to DIN EN 60529	IF	IP 42	
Protection class		I	
Contamination level		2	
Overvoltage category		II	
Plate material	Aluminium alloy	Aluminium with	
		ceramic coating	
Plate dimensions	Ø 135 mm	137 x 137 mm	
Dimensions ($W \times D \times H$)	160 × 27	0 × 85 mm	
Weight	2.3 kg	2.6 kg	
Operation at a terrestrial altitude	max.	2000 m	
Stirring function		1	
Number of stirring positions May stirring quantity (H2Q)			
Max. stirring quantity (H2O)		201	
Speed display set value		0 / 50 1500 rpm	
Speed display set-value		LCD	
Speed display actual-value		LCD	
Speed setting		rotating knob	
Speed setting accuracy		10 rpm	
Speed variation (no load, nominal voltage,	± 2 % o	f 1500 rpm	
at 1500 rpm, ambient temperature + 25 °C)			

INNOTEG-ScienceOne Overhead Stirrer — Tor Series

>>> Compact design and high performance

Tor series overhead stirrers include Tor M20 A and Tor M80 A

Our Tor series overhead stirrer is suitable for continuous stirring reaction of samples with thick viscosity, can be combined with a variety of mixing paddles to meet the mixing purposes.





Tor M20 A

- > Speed range: 50-2000 rpm, LED display
- > Maximum viscosity: 10000 mPas
- > Maximum torque of the mixing shaft: 20 Ncm
- Cast aluminum shell material coating to provide good sealing with high degree of protection of IP 54
- > Compact body design, space-saving experiment
- > Instrument compact and lightweight, easy to install and move

Tor M80 A

- > Speed range: 50-500 rpm, LED display
- > Maximum viscosity: 60000 mPas
- > Maximum torque of the mixing shaft: 80 Ncm
- Cast aluminum shell material coating to provide good sealing with high degree of protection of IP 54
- > Compact body design, space-saving experiment
- > Instrument compact and lightweight, easy to install and move

Technical Specification — Overhead Stirrers

TECHNICAL DATA	Tor M20 A	Tor M80 A	
Drive unit			
Speed range under nominal load	0 / 50 2000 rpm	0 / 50 500 rpm	
Speed adjustment	Ste	pless	
Speed display	L	ED	
Speed setting accuracy	±:	l rpm	
Speed measurement deviation	Speed < 300	rpm: ± 3 rpm	
	Speed > 30	0 rpm: ± 1 %	
Max. torque at stirrer shaft	20 Ncm	80 Ncm	
Max. stirring quantity (water)	15 l	50 l	
Max. viscosity	10000 mPa•s	60000 mPa•s	
Permitted on time	10	00 %	
Nominal voltage	24	24 VDC	
Max. current	290	2900 mA	
Max. input power	6	69 W	
Max. output power at stirring shaft	4	42 W	
IP code according to EN 60529	IF	IP 54	
Contamination level		2	
Protection at overload	motor curre	motor current limitation	
Ambient temperature	5	5 40 °C	
Ambient humidity (rel.)	8	80 %	
Drive	Brushles	Brushless DC-Motor	
Clamping chuck-clamping range	0.5	0.5 8 mm	
Hollow shaft internal diameter	8.5	8.5 mm	
Extension arm (Ø \times L)	13 mm	13 mm × 160 mm	
Dimensions (W \times D \times H)	70 mm × 147	70 mm × 147 mm × 193 mm	
(without extension arm)			
Weight	1.56 kg	1.72kg	
(with extension arm and clamping chuck)			
Operation at a terrestrial altitude	max.	2000 m	
Weight (with extension arm and clamping chuck)			
ver supply		240140	
Input		100 240 VAC	
		1.3 A	
		. 60 Hz	
Output		24 VDC	
	9	90 W	
Protection class		I	

INNOTEG-ScienceOne Pipettes — Pett Series

>>> Ergonomic design, fully autoclavable

Our single Fix and Vario pipettes can be used for many applications in the laboratory.

Color coding simplifies the rapid selection of a suitable pipette.

Resistance to impact, UV and chemicals ensures that the tip cone provides long-term reliable dosing. The Pett Fix and Vario are fully actoclavable, therefore ensuring easy sterilization. This guarantees fault-free, precise and safe operation.



> Durable construction

› A large display

> User-friendly calibration

> Simple maintenance and adjustment

> Fully autoclavable

Pett Fix	IDENT. NO.	MAX. VOLUME 1
5 μΙ	0020022806	10 μΙ
10 μΙ	0020022839	10 μΙ
20 μΙ	0020022840	200 μΙ
25 μΙ	0020022841	200 μΙ
50 μΙ	0020022842	200 μΙ
100 μΙ	0020022843	200 μΙ
200 μΙ	0020022844	200 μΙ

0020022845

0020022847

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1,000 μΙ

Pett Vario	IDENT. NO.	MAX. VOLUME TIP
0.1-2 μΙ	0020022804	10 μΙ
0.5-10 μΙ	0020022831	10 μΙ
2 - 20 μΙ	0020022832	200 μΙ
10 - 100 μΙ	0020022833	200 μΙ
20 - 200 μΙ	0020022834	200 μΙ
100 - 1, 000 μΙ	0020022835	1,000 μΙ
0.5-5 ml	0020022836	5 ml
1 - 10 ml	0020022838	10 ml





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