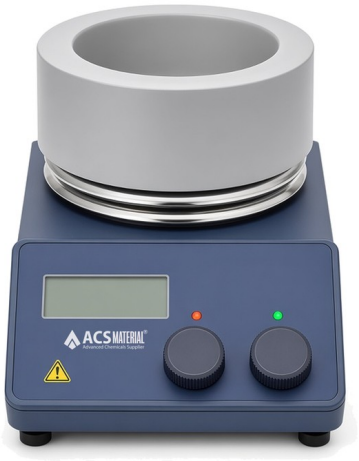
TECHNICAL DATA SHEET

ALab™ MS-H280-B / MS-H280-F Magnetic Stirrer with Electric Heating Mantle

Magnetic stirrer with electric heating mantle · 100 to 1000 mL beakers or flasks · RT to 280°C · 200 to 1500 rpm



ALab™ MS-H280-B / MS-H280-F Magnetic Stirrer with Electric Heating Mantle

The ALab™ MS-H280-B / MS-H280-F Magnetic Stirrer with Electric Heating Mantle, shown with one mantle size; image shown for reference.

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SECTION I

Product Overview

The ALab™ MS-H280-B / MS-H280-F series are magnetic stirrers with electric heating mantles for 100 to 1000 mL flat bottom beakers (B) or round bottom flasks (F). They heat from RT to 280°C and stir at 200 to 1500 rpm.

The aluminum silicate fiber cotton heating sleeve gives accurate temperature control and uniform heating; a temperature self-calibration function, strengthened magnetic fields and a maintenance-free brushless DC motor complete the design. The unit can be used as one heating magnetic stirrer, or as one heating sleeve plus one magnetic stirrer.

SECTION II

Core Advantages

- **Vessels** — 100 to 1000 mL, B or F
- **Speed** — 200 to 1500 rpm
- **Sleeve** — aluminum silicate fiber
- **Heating** — RT to 280°C
- **Display** — Speed and temperature display
- **Safety** — HOT warning, 2 circuits

SECTION III

Specifications

Technical data — MS-H280-B / MS-H280-F series

Specifications	
Brand	ALab™ by ACS Material
Models	MS-H280-B100, MS-H280-B250, MS-H280-B500, MS-H280-B1000, MS-H280-F100, MS-H280-F250, MS-H280-F500, MS-H280-F1000
ACS Cat. No.	Parent ALMSHBFG; ALMS0500, ALMS0600, ALMS0700, ALMS0800, ALMS0900, ALMS0A00, ALMS0B00, ALMS0C00
Compatible containers	B: 100, 250, 500, 1000 mL flat bottom beakers; F: 100, 250, 500, 1000 mL round bottom flasks
Heating mantle material	Aluminum silicate fiber cotton
Motor type	Brushless DC motor
Speed range	200 to 1500 rpm
Speed control accuracy	±20 rpm
Temperature control range	RT to 280°C
"HOT" warning	50°C
Overheat protection	420°C
Heating liquid temperature control accuracy	±1°C (<100°C), ±1% (>100°C)
External temperature sensor	PT1000 (accuracy ±0.2°C)
Protection class	IP21
Motor output power	1.8 W
Voltage, frequency	100 to 120 V, 60 Hz; 200 to 240 V, 50 Hz
Dimensions [W × D × H]	295 × 160 × 160 mm
Weight	3.7 kg
Permissible ambient temperature and humidity	5 to 40°C, 80% RH

Models and heating mantles

Model	Heating mantle	Vessel	Capacity	Mantle inner diameter	ACS Cat. No.
MS-H280-B100	HB100	Flat bottom beaker	100 mL	54.75 mm	ALMS0500
MS-H280-B250	HB250	Flat bottom beaker	250 mL	72.75 mm	ALMS0600
MS-H280-B500	HB500	Flat bottom beaker	500 mL	89.75 mm	ALMS0700
MS-H280-B1000	HB1000	Flat bottom beaker	1000 mL	118.75 mm	ALMS0800
MS-H280-F100	HF100	Round bottom flask	100 mL	72.75 mm	ALMS0900
MS-H280-F250	HF250	Round bottom flask	250 mL	89.75 mm	ALMS0A00
MS-H280-F500	HF500	Round bottom flask	500 mL	118.75 mm	ALMS0B00
MS-H280-F1000	HF1000	Round bottom flask	1000 mL	144.75 mm	ALMS0C00

Control and design

Function	Detail
Controls	Temperature adjustment knob and speed adjustment knob; power switch
Display	Display screen; heating indicator and stirring indicator
Temperature control	RT to 280°C; temperature self-calibration function; external PT1000 temperature sensor (accuracy ±0.2°C)
Safety	"HOT" warning flashes above 50°C even when the hotplate is turned off, as long as the power cable is connected; two independent safety circuits: an error code and heating stop on sensor malfunction and overheating, power cut by the second circuit if the first is shorted
Protection class	IP21

Scope of delivery

— Standard configuration: MS-H280 magnetic stirrer with the heating mantle of the selected model.

SECTION IV

Applications

Magnetic stirrers with heating sleeve are used in laboratories in scientific research, industry and mining, food processing, biochemistry, agriculture, petrochemical, pharmaceutical and education, for heating and incubation of liquids at a set temperature.

Specifications are per the tables above.

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