

519 | Mini Test Press



Model MP-WNL



Model MP-2F
(With swivel type water cooling plate)



Model MP-SNL



Model MP-WC
(Unheated model)

- **Variable stroke setting device**

Upper limit position of the upper heating platen can be set as desired with the knob.



- **High temperature timer switch**

When the platen temperature is 300°C or higher, turning this switch ON shuts off the heater energization. The main breaker is automatically turned off after the fan has operated for approximately 50 minutes according to the timer. (Only for models with a maximum temperature specification of 400°C)



High temperature timer switch

■ APPLICATION

The compact, bench-top **Mini Test Press** is used as a plastic compression molding and rubber vulcanizing sample press. The press is equipped with a two-speed manual hydraulic cylinder pressure system.

The speed automatically switches when moving the compression plate or supplying compression force.

The positive hold mechanism prevents pressure loss.

The Mini Test Press is also equipped with overheat protection. An optional water-cooled, insulated platen sandwich to cold press samples without cooling down platen is also available.

■ FEATURES

- Compact, bench-top size; clean, space saving modern design.
- Superior temperature distribution with high heating rates to 300°C or 400°C maximum.
- Separate upper and lower platen PID temperature controllers with overheat protection.
- Optional water cooling platen for sample cooling and compression molding. (MP-S)
- By means of swivel type cooling platen, sample cooling and compression molding is possible without lowering the temperature of heating platen. (MP-2F)
- Two-stage manual hydraulic system for precise compression to 100kN (10 ton) capacity.
- 200 x 200mm or 250 x 250mm platen sizes available.

■ SPECIFICATIONS

Max. clamping force	100kN (gauge pressure 30MPa)
Max. temperature	● 300°C (MP-SNL, MP-SCL, MP-2F, MP-WNL, MP-WCL) ● 400°C (MP-SNH, MP-SCH, MP-2FH, MP-WNH, MP-WCH)
Dimensions of heating platen	● 200 x 200mm (MP-S and MP-2 models) ● 250 x 250mm (MP-W models)
Clearance at close contact between upper and lower heating platen	0.5mm or less
Stroke	● Max. 100mm (MP-SNL, MP-SNH, MP-WNL, MP-WNH) ● Max. 90mm (MP-SC, MP-WC) ● Max. 75mm (MP-SCL, MP-SCH, MP-WCL, MP-WCH) ● Max. 25mm (MP-2F, MP-2FH)
Pressure indicator	Analog pressure gauge Max. scale: 35MPa
Manual hydraulic pump	2-speed type (automatic switching)
Heaters	Cartridge type balanced heaters
Temperature control	Dual PID controllers, with auto tuning function, digital readouts
Safety devices	Overheat protection circuit, leakage/over current breaker
Power supply	Single-phase, AC200V, 50/60Hz, 4.0kVA (except unheated models)
Cooling water	0.15MPa, max. 20L/min. (for cooling platen equipped models)
Dimensions	W520 x D390 x H680mm (Handle, release valve etc. is not included)
Weight (approx.)	90kg

■ MODELS

200 x 200mm models

Model	Platen Size	Water Cooling Plate	Max Temp
MP-SNL	200 x 200mm	N/A	300°C
MP-SNH	200 x 200mm	N/A	400°C
MP-SCL	200 x 200mm	Fixed type	300°C
MP-SCH	200 x 200mm	Fixed type	400°C
MP-2F	200 x 200mm	Swivel type	300°C
MP-2FH	200 x 200mm	Swivel type	400°C
MP-SC	200 x 200mm	Unheated, water cooling only	

250 x 250mm models

Model	Platen Size	Water Cooling Plate	Max Temp
MP-WNL	250 x 250mm	N/A	300°C
MP-WNH	250 x 250mm	N/A	400°C
MP-WCL	250 x 250mm	Fixed type	300°C
MP-WCH	250 x 250mm	Fixed type	400°C
MP-WC	250 x 250mm	Unheated, water cooling only	

■OPTIONS

Photo	Name	Model	Description
	Inter-lock type safety cover	ISC	- When the safety cover is opened, the heating platen stops. - Not available for MP-2F, MP-2FH - Optional power supply is required for unheated models
	Safety cover	SC	Not available for MP-2F, MP-2FH
	Overheat protection unit	TEMPG	- Temperature controller box added on top of mainbody - Approx. W150 x D250 x H150mm 2 temperature controllers, 2 K thermocouples (1 each for upper and lower heating platen) - Overheat protection setting temperature: Max. 400°C - Not available for MP-SC, MP-WC
	Temperature controller (Programmed heating rate)	T-CONT	Max. heating rate: 12°C/min. Max. heating steps: 16 steps Setting time: 0 to 99h59m/step
	Air cooling unit	AIR-C	- Air flows through cooling pipes to increase cooling efficiency - Compressed air is required.
	Platen parallel assist mechanism	PARA	Assist in paralleling the upper and lower platen. The parallelism of the vertical movement of the hydraulic cylinder is assisted by linear guide.

Specifications are subject to change without notice.



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