

Muffle Furnaces

**FO100/200/300/310/410/510/610/710/810**



Temperature Range	100deg.C to 1,150deg.C
Temperature Control Accuracy	±2deg.C
Internal Capacity	1.5 to 30 L

This FO series represent standard type of muffle furnaces which use a microprocessor controlled thermoregulator and which are capable of heat processing characterized by excellent repeat ability.

- Due to the high adiabatic characteristic, temperature rises in a very short time.
- Space-saving and compact type. But inner capacity is large.
- Equipped with self-diagnosis function.

■ Specifications

Model	FO100	FO200	FO300	FO310	FO410
<b>Performance</b>					
Operating temperature range	100 to 1,150deg.C				
Temp. control accuracy	±2deg.C(at 1,150deg.C)				
Max. temp. reaching time	Approx.60min.	Approx.60min.	Approx.70min.	Approx.70min.	Approx.70min.
<b>Components</b>					
Exterior material	Cold rolled steel plate with baked-on melamine resin finish				
Furnace material	Ceramic fiber				
Sensor	R-thermocouple (Double sensor)				
Heater	Iron-chrome wire heater				
	1 kW	1.5 kW	2 kW	2 kW	2.2 kW
Cooling Fan Type	Auxial type fan				
<b>Controller</b>					
Temp. controller	PID control by microprocessor				
Temp. setting method	Digital setting with UP/DOWN key				
Temp display method	Digital display				
Over heating prevention	On-off control by microprocessor				
Over heating prevention setting method	Digital setting				
Operation function	Program operation (6 patterns 30 steps or 2 pattern 15 steps or 3 patterns 10 steps)				
Additional function	Calibration offset function, power failure compensation function				
Timer	1 min. to 99 Hrs. 59 min. and 100 Hrs. to 999 Hrs. Digital setting, Auto-start, Quick auto-stop				
<b>Safe Device</b>					
	Self diagnosis functions (Heater, Sensor, SSR, Overheat prevention), Electric leakage breaker, Over heating prevention device.				
<b>Standard</b>					
Internal dimensions (mm)	100×150×100	100×250×150	200×250×150	200×250×150	200×300×150
External dimensions (W×D×Hmm)	346×405×517	346×505×567	446×505×567	446×505×567	446×555×567
Internal capacity	1.5L	3.75L	7.5L	7.5L	9.0L
Power source 50/60Hz (single phase)	AC100V 10A(15A)	AC100V 16A(20A)	AC100V 21A(30A)	Single phase AC200V 11A(20A)	Single phase AC200V 12A(20A)
Weight	Approx.24kg	Approx.30kg	Approx.37kg	Approx.37kg	Approx.38kg
<b>Accessories</b>					
	Exhaust port cap 1 pc.				

The projection is not included for Internal dimensions and External dimensions.

Model	FO510	FO610	FO710	FO810
<b>Performance</b>				
Operating temperature range	100 to 1,150deg.C			
Temp. control accuracy	±2deg.C(at 1,150deg.C)			
Max. temp. reaching time	Approx.80min.	Approx.80min.	Approx.80min.	Approx.80min.
<b>Components</b>				
Exterior material	Cold rolled steel plate with baked-on melamine resin finish			
Furnace material	Ceramic fiber			
Sensor	R-thermocouple (Double sensor)			
Heater	Iron-chrome wire heater			
	2.5 kW	3 kW	3.5 kW	4 kW
Cooling Fan Type	Auxial type fan			
<b>Controller</b>				
Temp. controller	PID control by microprocessor			
Temp. setting method	Digital setting with UP/DOWN key			
Temp display method	Digital display			
Over heating prevention	On-off control by microprocessor			
Over heating prevention setting method	Digital setting			
Operation function	Program operation (2 patterns 8 steps or 1 pattern 16 steps)			
Timer	1 min. to 99 Hrs. 59 min. and 100 Hrs. to 999 Hrs. Digital setting, Auto-start, Quick auto-stop			
<b>Safe Device</b>				
	Self diagnosis functions (Heater, Sensor, SSR, Overheat prevention), Electric leakage breaker, Over heating prevention device.			
<b>Standard</b>				
Internal dimensions (mm)	300×250×150	250×350×200	270×350×250	300×400×250
External dimensions (W×D×Hmm)	507×574×627	507×604×677	507×605×727	507×655×727
Internal capacity	11.3L	17.5L	23.6L	30.0L
Power source 50/60Hz (single phase)	Single phase AC200V 13.5A(20A)	Single phase AC200V, 16A(20A)	Single phase AC200V 18.5A(30A)	Single phase AC200V 21A(30A)
Weight	Approx.44kg	Approx.52kg	Approx.58kg	Approx.62kg
<b>Accessories</b>				
	Exhaust port cap 1 pc.			

The projection is not included for Internal dimensions and External dimensions.

#### ■ Control Panel



#### ■ Interior



#### ■ Temp. Output Terminal



(Optional Accessory)

#### ■ Exhaust Unit

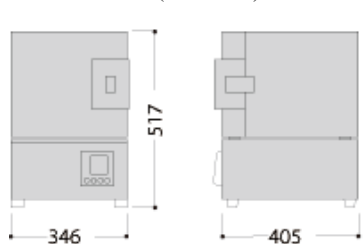


(Optional Accessory)

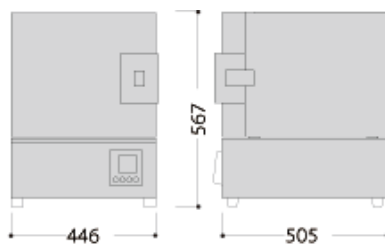
■ Sample tray



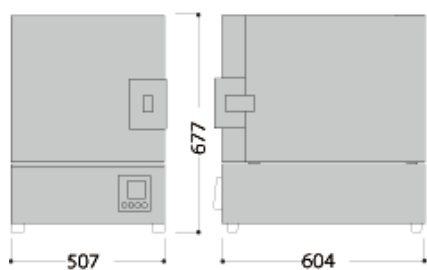
■ Dimensions (Unit:mm)



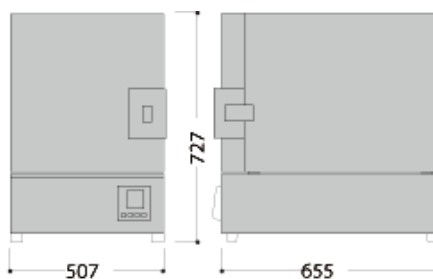
[FO100]  
(1.5r)



[FO300/310]  
(7.5r)



[FO610]  
(17.5r)



[FO810]  
(30r)

■ Optional Items

Description	Model No.	Product Code
Exhaust unit, 100V, for FO100, FO200, 300	FO Series	214160
Exhaust unit 200V, for FO310, FO410, F510, FO610, FO710, FO810	FO Series	214161
Time-up output terminal, for all of FO series	FO Series	281301
Temperature Output Terminal 4-20mA, for all of FO series	FO Series	281302
N2 gas inlet system with flow meter, for all of FO series	FO Series	281303
Sample tray, for all of FO series	FO Series	281310