

Forced Convection Oven

250°C | 300°C

LAB1ST FCO250 and FCO300 Series Forced Convection Ovens are designed for demanding applications such as desiccation, torrefaction, wax-melting, and sterilization in mining, laboratories, and research.

Featuring a durable mirror-finish stainless steel chamber with argon arc welding, these ovens include a high-temperature resistant synthetic silicone seal and a standard independent over-temperature controller for safety and reliability.



Features

> **Mirror-polished 304 stainless steel interior** is assembled with argon arc welding for exceptional durability, corrosion resistance, and easy cleaning.

> **New synthetic silicone door gaskets** provide advanced thermal sealing, capable of withstanding long-term high-temperature operation to minimize heat loss.

> **Sophisticated PID microprocessor controller** ensures precise and stable temperature control ($\pm 1^\circ\text{C}$) with a timer function from 0 to 9999 minutes.

> **Independent over-temperature protection system** automatically cuts off heating power when temperature exceeds set limits for safe operation.

> **High-temperature resistant air circulation system**, comprising a durable fan and optimized air duct, ensures superior temperature uniformity.

> **Built-in damper adjustment** on the control panel allows precise regulation of intake and exhaust airflow levels within the chamber.

Options

FCO-RS485

RS485 interface and communication software [excluding FCO250-13L and FCO300-15L]



FCO-Printer

Embedded printer [excluding FCO250-13L and FCO300-15L]



FCO-DataExport

USB data storage and export



FCO-ProgramCtrl

Multi-segment programmable LCD temperature controller



FCO-TestHole

Test hole ($\Phi 25\text{mm}$) for external probes or cabling



Specification

FCO250 Series >>>

Model	FCO250-13L	FCO250-23L	FCO250-30L	FCO250-55L	FCO250-70L	FCO250-123L
Temperature Range	RT+10 C ~250 C					
Display Resolution	0.1 C					
Temperature Stability	±1 C					
Temperature uniformity	±3% (at 100 C)					
Ambient Temperature	+5~40 C					
Chamber Volume	16 L 0.57 cu ft	30 L 1.06 cu ft	30 L 1.06 cu ft	50 L 1.77 cu ft	80 L 2.83 cu ft	136 L 4.80 cu ft
Shelves	2 pcs	2 pcs	2 pcs	2 pcs	2 pcs	2 pcs
Interior Dimension (W×D×H, mm)	250×260×250	340×325×320	340×320×320	420×395×350	450×400×450	550×450×550
Exterior Dimension (W×D×H, mm)	530×370×420	620×440×490	620×440×490	720×530×520	740×530×630	840×580×730
Power Consumption	850 W	850 W	850 W	1100 W	1550 W	2050 W
Electrical Requirement	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz
Timing Range	0~9999min					

Model	FCO250-140L	FCO250-203L	FCO250-240L	FCO250-420L	FCO250-620L	FCO250-920L
Temperature Range	RT+10 C ~250 C					
Display Resolution	0.1 C					
Temperature Stability	±1 C					
Temperature uniformity	±3% (at 100 C)					
Ambient Temperature	+5~40 C					
Chamber Volume	136 L 4.80 cu ft	198 L 6.99 cu ft	220 L 7.77 cu ft	420 L 14.83 cu ft	620 L 21.89 cu ft	1000 L 35.31 cu ft
Shelves	2 pcs	2 pcs	2 pcs	3 pcs	4 pcs	4 pcs
Interior Dimension (W×D×H, mm)	550×450×550	600×500×600	600×500×750	640×585×1355	840×600×1355	800×700×1590
Exterior Dimension (W×D×H, mm)	840×580×730	880×765×780	880×630×930	780×730×1780	980×800×1880	1050×880×2060
Power Consumption	2050 W	2450 W	2450 W	3100 W	4000 W	5200 W
Electrical Requirement	220V 50Hz	220V 50Hz	220V 50Hz	380V 50Hz	380V 50Hz	380V 50Hz
Timing Range	0~9999min					

FCO300 Series >>>

Model	FCO300-15L	FCO300-35L	FCO300-55L	FCO300-75L	FCO300-145L	FCO300-245L	FCO300-425L	FCO300-625L
Temperature Range	RT+10~300 C							
Display Resolution	0.1 C							
Temperature Stability	±1 C							
Temperature uniformity	±3% (at 100 C)							
Ambient Temperature	+5~40 C							
Chamber Volume	16 L 0.57 cu ft	30 L 1.06 cu ft	50 L 1.77 cu ft	80 L 2.83 cu ft	136 L 4.80 cu ft	220 L 7.77 cu ft	420 L 14.83 cu ft	620 L 21.89 cu ft
Shelves	2 pcs	2 pcs	2 pcs	2 pcs	2 pcs	2 pcs	3 pcs	4 pcs
Internal Dimension (W×D×H, mm)	250×260×250	340×320×320	420×395×350	450×400×450	550×450×550	600×500×750	640×585×1355	840×600×1355
External Dimension (W×D×H, mm)	530×370×420	620×440×490	720×530×520	740×530×630	840×580×730	880×630×930	780×730×1780	980×800×1880
Power Consumption	850 W	850 W	1100 W	1550 W	2050 W	2450 W	3100 W	4000 W
Electrical Requirements	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz	220V 50Hz	380V 50Hz	380V 50Hz
Timing Range	0~9999min							

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