Recirculating Chiller F-105 / F-108 / F-114
The efficient way of cooling

Three recirculating chiller versions with different performance options for your personal needs available. Remote controlled cooling allows easy operation. Very efficient distillation thanks to the complete integration of the cooling device in the evaporation system.

Efficient
3 versions differing in performance available, selectable for individual needs

Ecological
Saves water, reduces emissions and conserves energy

Interactive
Well integrated into the BUCHI evaporation system

F-105 / F-108 / F-114: Your most important benefits

Efficient

· 3 versions available differing in performance, optimized for individual application
· Efficient distillation due to complete integration into the BUCHI evaporation system
· Shuts off automatically between distillations, hence unnecessary downtime is eliminated

Ecological

· Sustainable operation due to no water consumption
· Conserves energy by switching into standby-mode if not in use
· Reduces solvent emissions of the distillation

Interactive

· Process optimization due to interaction with the entire Rotavapor®-system
· Optimized handling by centralized process control
· Perfectly compatible with a variety of BUCHI products

Complete your portfolio

Rotavapor®
R-215
Excellence in evaporation

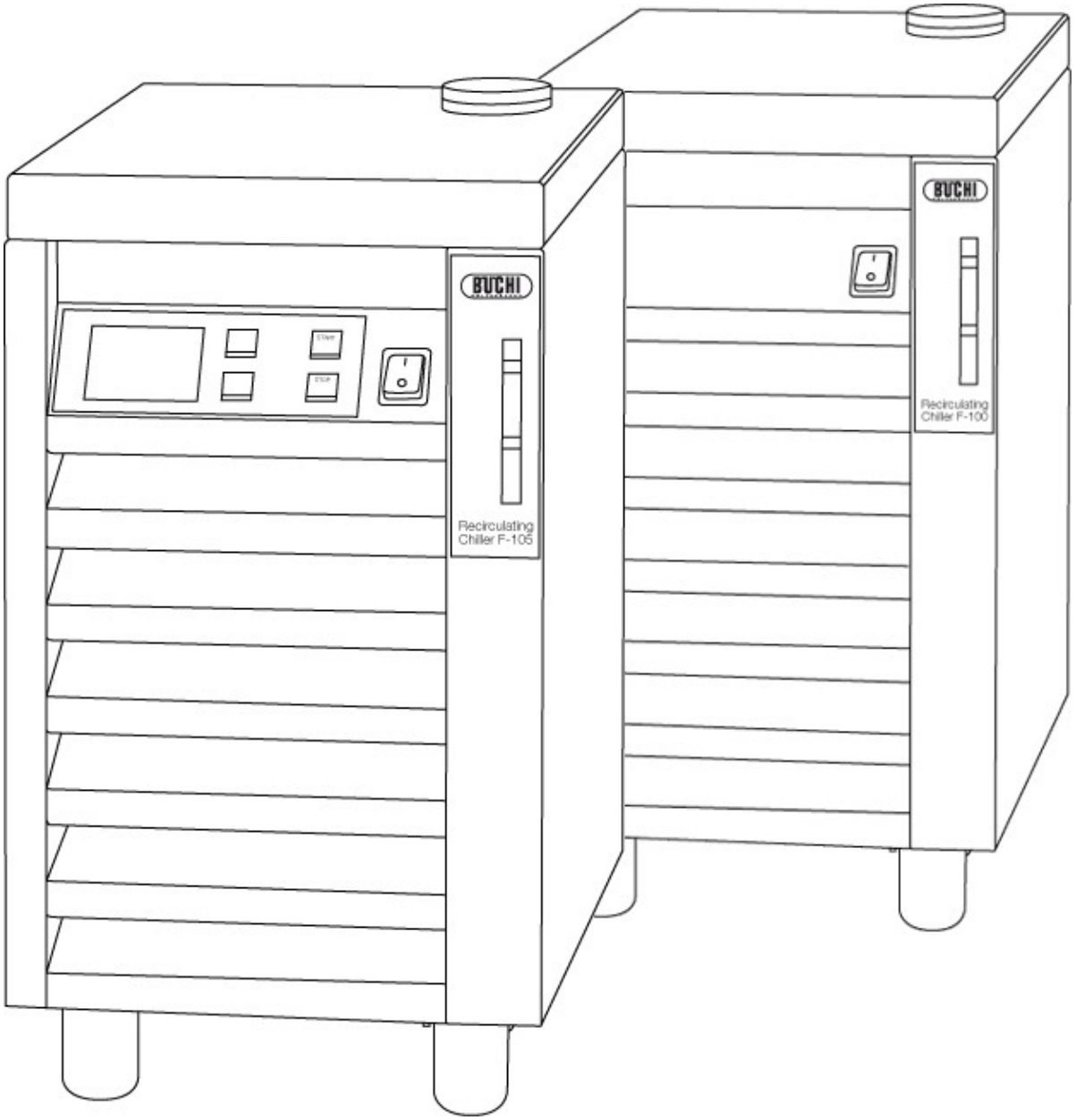
Multivapor™
P-6 / P-12
Efficient evaporation for multiple samples

Syncore®
Analyst
Maximize multiple sample workup efficency

Extraction Systems
B-811 / B-811 LSV
Universal extraction

Recirculating Chiller F–100 / F–105
Technical data sheet

The F-100 and F-105 are environmentally friendly and compact recirculation chillers designed for one laboratory evaporator. The cooling temperature of the F-100 is fixed at 10 °C whereas the F-105 features an adjustable temperature with a higher cooling capacity. In addition, the F-105 of- fers ON/OFF regulation when used in conjunction with the Interface I-100.



Overview

The Recirculating Chiller F-100 and F-105 differ in their cooling capacity, temperature range and capability to communicate with the Interface I-100:

	F-100	F-105
Cooling capacity at 15 °C	---	530 W
Cooling capacity at 10 °C	300 W	390 W
Cooling capacity at 0 °C	---	120 W
Set temperature	10 °C (fix)	-10 °C to +25 °C
ON/OFF regulation with I-100	no	yes

* Measured at 20 °C ambient temperature. Typically required cooling capacity for a rotary evaporator is 400 W.

Scope of delivery

All configurations are supplied ready to use.

Components	F-100 / F-105
Hose clamp	4
Power cord	1
Instruction manual on CD	1
Hose barbs, GL-14; Ø 8 mm	2

Order Code

Choose the configuration according to your needs:

1 1 0 5 6 4 6 0 Recirculating Chiller F-100: 230 V with fixed cooling temperature of 10 °C

1 1 0 5 6 4 6 3 Recirculating Chiller F-105: 115 V with controllable cooling temperature -10 °C to +25 °C

1 1 0 5 6 4 6 2 Recirculating Chiller F-105: 230 V with controllable cooling temperature -10 °C to +25 °C

Technical data

Recirculating Chiller

	F-100	F-105
Dimensions (W x D x H)	280 x 420 x 500 mm	280 x 420 x 500mm
Weight	28 kg	30 kg
Cooling capacity at 15 °C*	-	530 W
Cooling capacity at 10 °C*	300 W	390 W
Cooling capacity at 0 °C*	-	120 W
Cooling capacity at -10 °C*	-	10 W
Set temperature range	fix at 10 °C	-10 °C to +25 °C
Power consumption (max.)	850 W	850 W
Heating emission	700 W	700 W
Supply voltage	230 VAC ± 10 % -	230 VAC ± 10 % or 115 VAC ± 10 %
Frequency	50/60 Hz	50/60 Hz
Temperature display	no display	digital, resolution 0.1 °C
Ambient temperature	5 – 35 °C	5 – 35 °C
Refrigerant	R 134a (280 g)	R 134a (280 g)
Temperature regulation accuracy	± 2 °C	± 1 °C
Tank volume	3 L	3 L
Tubing connection	8 mm (GL14)	8 mm (GL14)
Pump pressure (max.)	0.6 bar	0.6 bar
Flow rate	2.5 L/min	2.5 L/min
Compatibility with interface	-	I-100, V-850, V-855

* Measured at 20 °C ambient temperature. Typically required cooling capacity for a rotary evaporator is 400 W.

Accessories

	Order no.
Insulation tubing. Synthetic rubber, Ø10/23 mm, black, per m For insulation of cooling media. Meant to be used with silicone tubing (004134).	028696

Feature comparison

The Recirculating Chiller F-105 offers the following features:

Feature	Description	With interface
Temperature setting on chiller	Set the temperature in 0.1 °C increments using the navigation knob. Actual and set temperature is shown on the integrated display.	
ON/OFF regulation with interface	The Interface I-100 and Vacuum Controller V-850 / V-855 switch the recirculation chiller automatically ON when distillation starts, and OFF when the process is terminated.	•