

Heating & Cooling Blocks

Indispensable for incubation and activation of cultures, culture enrichment, enzyme reactions, immunoassay, etc.



Heating & Cooling Block
Heating Blocks

SELECTION GUIDE

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Description		Temperature Range (°C/F)	Temperature Fluctuation [±°C/°F]	Temperature Variation [±°C/°F]	Page
Heating & Cooling Block	CCB-350	Amb. -20 to 95 / Amb. -36 to 203	0.06 / 0.11 at 37°C	0.15 / 0.27 at 37°C	149
Heating Blocks	CHB-350S	Amb. +5 to 130 / Amb. +41 to 266	0.1 / 0.18 at 80°C	0.2 / 0.36 at 80°C	150
	CHB-350T				

Heating & Cooling blocks

Heating & Cooling Block

Rapid cooling and heating in centrifuge tubes, sample vials, micro tubes within the broad temperature range.

Outstanding temperature compensation function guarantees precise temperature control.



CCB-350 with the optional Blocks

Included Accessories • Block Lifters (2ea)

Optional Accessories • Tube Blocks

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Operating Features

- Precision accuracy of $\pm 0.1^{\circ}\text{C}$ is ensured by its PID controller.
- Wide temperature control range from Amb. -20 to 95°C with rapid cool down and heat-up times.
- Simple temperature calibration.
- Memory function of programmed protocols allowing relevant parameters of each protocol step to be stored.
 - Up to 10 protocols allowed for memory storage.
 - Up to 10 steps allowed for each protocol.
- Two types of timer modes:
 - Timer 1 starts immediately after the timer setting.
 - Timer 2 starts only after reaching the set temp.

Constructional Features

- Cooling is controlled by Peltier elements for an energy efficient compact design.
- Bright VFD display with responsive touch buttons.
- Its polypropylene main body is highly chemical-resistant and easy-to-clean.
- Optimal heat transfer is achieved by the tight coupling design of the main body and the corrosion-resistant anodized aluminum blocks.
- Transparent lid allows easy sample monitoring and even temperature distribution.
- Blocks can be easily interchanged by the included block lifter.

Specifications & Ordering Information



Model		CCB-350
Control System		Feedback control PID
Display		VFD(0.1 $^{\circ}\text{C}$ resolution)
Temperature	Range ($^{\circ}\text{C}$ / $^{\circ}\text{F}$)	Amb. -20 to 95 / Amb. -36 to 203
	Fluctuation at 37°C ($\pm^{\circ}\text{C}$ / $^{\circ}\text{F}$)	0.06 / 0.11
	Variation at 37°C ($\pm^{\circ}\text{C}$ / $^{\circ}\text{F}$)	0.15 / 0.27
Safety	Over Temp.	Heating plate PCB
	Over Current	Current limit protection
Dimension (WxDxH)	Internal (mm / inch)	99 x 77.5 x 36 / 3.9 x 3.1 x 1.4
	Overall (mm / inch)	249x325x168 / 9.8x12.8x6.6
	Net Weight (kg / lbs)	5.0 / 11.0
Electrical Requirements (230V, 50 / 60Hz)		2 A
Cat. No.		AAHJ5015K
Electrical Requirements (120V, 60Hz)		4 A
Cat. No.		AAHJ5013U

Heating & Cooling blocks

Heating Blocks

Ideal for simultaneous sample heating of multiple vials or test tubes with uniform and precise temperature control.

Operating Features

- Precision accuracy of $\pm 0.1^{\circ}\text{C}$ is ensured by its PID controller from ambient + 5°C to 130°C .
- Its built-in temperature limit setting feature (with max. 0.2°C overshooting) allows you to perform highly temperature sensitive reactions such as isothermal amplifications.
- Automatic power cutoff.
 - If the temperature of the main body exceeds 150°C .
 - If the internal circuit is overheated.
- Two types of timer modes:
 - Timer 1 starts immediately after the timer setting.
 - Timer 2 starts only after reaching the set temperature.



Constructional Features

- Its polypropylene main body is highly chemical-resistant and easy-to-clean.
- Optimal heat transfer is achieved by the tight coupling design of the main body and the corrosion-resistant anodized aluminum blocks.
- Bright VFD display with responsive touch buttons.
- Transparent lid allows easy sample monitoring and even temperature distribution.
- Blocks can be easily interchanged by the included block lifter.

CHB-350S / CHB-350T with the optional Blocks

Included Accessories • Block Lifters (2ea)

Optional Accessories • Tube Blocks

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Specifications & Ordering Information



Model		CHB-350S	CHB-350T
Control System		Feedback control PID	
Display		VFD(0.1°C resolution)	
Temperature	Range (°C / °F)	Amb. +5 to 130 / Amb. +41 to 266	
	Fluctuation at 80°C (±°C / °F)	0.1 / 0.18	
	Variation at 80°C (±°C / °F)	0.2 / 0.36	
Safety	Over Temp.	Heating plate	
	Over Current	PCB	
Dimension (WxDxH)	Internal (mm / inch)	154×99×37 / 6.1×3.9×1.5	
	Overall (mm / inch)	249×325×120 / 9.8×12.8×4.7	249×325×250 / 9.8×12.8×9.8
	Net Weight (kg / lbs)	3.9 / 8.6	4.3 / 9.5
Electrical Requirements (230V, 50 / 60Hz)		3.5A	
Cat. No.		AAHJ1015K	AAHJ1115K
Electrical Requirements (120V, 60Hz)		6.7A	
Cat. No.		AAHJ1013U	AAHJ1113U

Heating & Cooling blocks

Accessories & Options

Tube Blocks

Block	Cat. No.	Description	Max. Mountable Tube	WxDxH (mm, inch)	Mountable Capacity of Blocks		
					CHB-350S	CHB-350T	CCB-350
	CHB0030	96-well Tube Block (microtube)	0.2mL x 96 holes	153×98×41 / 6×3.9×1.6	1	1	-
	CHB0029	0.5 mL Tube Block (microtube)	0.5mL x 48 holes	98×76.5×41 / 3.9×3×1.6	2	2	1
	CHB0045	1.5 mL Tube Block (microtube)	1.5mL x 30 holes	98×76.5×41 / 3.9×3×1.6	2	2	1
	CHB0028	1.5 mL Tube Block (microtube)	1.5mL x 48 holes	153×98×41 / 6×3.9×1.6	1	1	-
	CHB0031	15 mL Tube Block (centrifuge tube)	15mL x 15 holes	98×76.5×51 / 3.9×3×2	2*	2	1*
	CHB0032	50 mL Tube Block (centrifuge tube)	50mL x 6 holes	98×76.5×51 / 3.9×3×2	2*	2	1*
	CHB0033			98×76.5×87 / 3.9×3×3.4	2*	2	1*
	CHB0034	Ø10 Tube Block	Ø10 x 35 holes	98×76.5×51 / 3.9×3×2	2*	2	1*
	CHB0035	Ø12 Tube Block	Ø12 x 24 holes		2*	2	1*
	CHB0036	Ø13 Tube Block	Ø13 x 24 holes		2*	2	1*
	CHB0037	Ø15 Tube Block	Ø15 x 20 holes		2*	2	1*
	CHB0038	Ø16 Tube Block	Ø16 x 16 holes		2*	2	1*
	CHB0039	Ø18 Tube Block	Ø18 x 12 holes		2*	2	1*
	CHB0040	Ø20 Tube Block	Ø20 x 12 holes		2*	2	1*

* Available to use only when the lid is opened.