

# Hot water circulator HC-03/06/09/12/15/24

**Circulation of hot water up to +80°C with high accuracy  $\pm 0.5^\circ\text{C}$ . Various customized options such as heater output and pump capacity upon the request.**



HC-06

**NEW**

## Features

- Basic operating temperature range up to +80°C
- Available in cooling function by primary cooling water
- Heater output, pumping capacity, wetted part, etc. can be changed

## Main Applications

- Hot water circulation to molding machine, Semiconductor manufacturing equipment, HVAC, etc.
- A source of heat load for equipment testing

**Hot water circulator with high accuracy. Various customized such as heater output and number of pumps, etc.**

Heating temperature control with high accuracy  $\pm 0.5^\circ\text{C}$  in temperature range 40°C to 80°C.

Various customized options such as heater output, number of pumps, piping material, etc. based on the following models. Please feel free to contact us.

Model	HC-03	HC-06	HC-09	HC-12	HC-15	HC-24
Temperature range (*1)	+40°C to +80°C					
Control accuracy	PID controller, $\pm 0.5^\circ\text{C}$					
Heater output	3.0 kW	6.0 kW	9.0 kW	12.0 kW	15.0 kW	24.0 kW
Pump ability (50/60 Hz)	Max. discharge pressure [MPa]		0.52		0.59	
	Flow rate [L/min] (*2)		22/31		42/55	
	Motor output [kW]		0.4		0.75	
Water bath capacity (at 80% water level)			28 L			110 L
Safety device/function						
Short/Over current breaker, Phase-reversal relay, Warning and Cut off for low water, Circulating water high temperature, Pump overcurrent, Overheating protection						
Connecting pipe diameter (Circulating fluid in/out)				Rc3/4		
Dimensions				627×772×1130H mm		
Weight		approx. 105 kg	approx. 110 kg	approx. 120 kg	approx. 190 kg	approx. 200 kg
Power Supply (three phase AC 200 V, 50/60 Hz)		20 A	30 A	40 A	50 A	60 A
Operation current (50/60 Hz)		12 A	21 A	29 A	38 A	46 A

(\*1)The lower limit may change depending on operating conditions. Cannot be used for applications on circulating water returns for temperature increases. (\*2)Capacity when using tap water. The value when the discharge pressure at 0.3 MPa. •The sensitivity current in ELCB should be set larger than 30 mA. •The primary cooling water is required when the cooling function is added. The cooling capacity depends on the cooling water conditions (Water temperature and Flow rate). •The fee for Delivery, Installing, Piping work, and Wiring work are quoted separately.

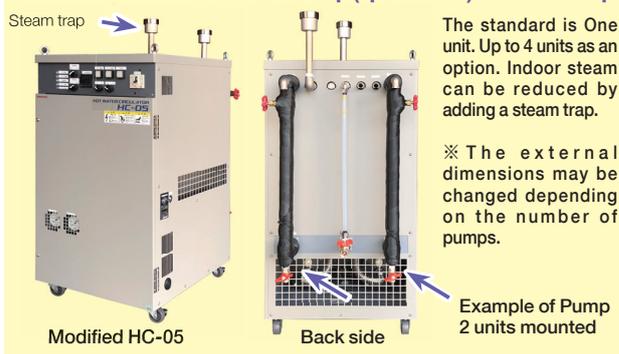
## Examples of Customization

### •The primary cooling water is required when the cooling function is added.



The standard model of the Hot water circulator HC series is equipped with only the Heating function. The cooling function can be added by increasing the cooling coils into the water bath when the steps to lower the temperature are required. It is recommended to lower the tank temperature earlier than waiting for natural cooling.  
 ※ The primary cooling water is required when the cooling function added. Please contact us for more information.

### •Addition of Pump (up to 4 units) and Steam trap.



The standard is One unit. Up to 4 units as an option. Indoor steam can be reduced by adding a steam trap.

※ The external dimensions may be changed depending on the number of pumps.

Example of Pump 2 units mounted