SX

Autoclaves | **SX series**

[SX-300] [SX-500] [SX-700]

TOMY

SPEEDY AUTOCLAVES SX SERIES

SX

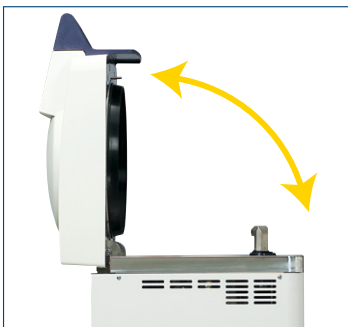## Autoclaves SX series
### [SX-300] [SX-500] [SX-700]

[SX-300]

NEW!

[SX-500]

[SX-700]

Easy operation using the "Top-open lid"

A top-open lid, which can be operated easily with a single hand or foot, is provided with the SX autoclaves. To open the lid, the lid lock is released by stepping on the foot pedal locates at the bottom while pressing the lid down. The lid can be opened with minimal effort owing to mechanical assistance. In addition, the lid can be closed easily just by pressing it down.
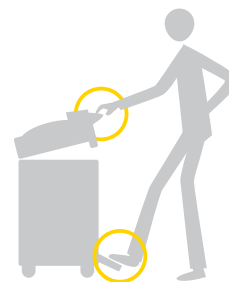
SPEEDY AUTOCLAVES

Saving the installation space

The main body is very compact owing to the design which provides thorough installation space saving. In addition, installation space at the side of the main body which is required for models employing a slide-open lid, which is not necessary at SX autoclaves top-open lid. Even when several SX autoclaves are installed side-by-side, the necessary installation space is minimized.

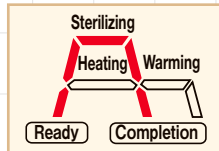## Cooling fan provided as a standard feature

A rapid air-cooling function (vessel-cooling fan) permitting reduction of chamber cool down time is provided as a standard feature. This is most appropriate for lowering the temperature rapidly on completion of the cycle. The time required for lower the temperature is much reduced by employment of the cooling fan in comparison with natural cooling.

Sterilizing course selection

The optimal sterilizing course can be selected from among five courses, such as the liquid sterilizing course in addition to that for normal sterilization.

790 mm（SX-300）・970 mm（SX-500）・1003 mm（SX-700）
614 mm（SX-300）・794 mm（SX-500）・827 mm（SX-700）
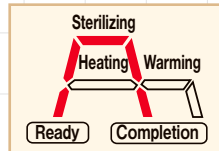410 mm（SX-300/500）
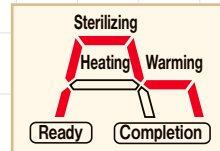470 mm（SX-700）

Liquid sterilizing course
This is most appropriate course setting for prevention of sudden sample boiling
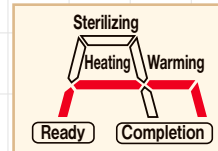
Sterilizing course
Course for normal sterilization
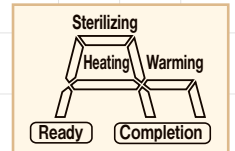
Sterilizing-warming course
Prevents culture media from coagulating after sterilization.

Heating-warming course
Extremely convenient for dissolving culture media and warming

Memory recall
Preferred operating conditions can be recalled up easily.

Easily viewable "work monitor"
The LED display shows working status for easy monitoring. The process being performed is indicated by an LED indication lamp blinking in red.

The illuminated display on the operating panel shown in the picture is different from the actual display at the time of operation.

Large indication lamp "Operated"
An easily viewable large indication "Operated" is provided at the upper section of the operating panel. Depending on the pressure status （normal pressure/pressure is applied）, the displayed color changes.

Auto-variable exhaust speed
A function allowing the exhaust valve to open automatically after completion of sterilization is provided. The exhaust speed can be set to one of six levels （set to variable for liquid sterilization）.

Setting to 100 °C is possible.
Variable temperature setting such as to 100 °C as well as to 121 °C has been made possible. The temperature can be set within the range from 45 °C to 135 °C in steps of one degree （heating mode up to 104 °C）.

Heating | Sterilizing
45℃   100℃ 121℃ 135℃
Heating Sterilizing 135℃
45℃
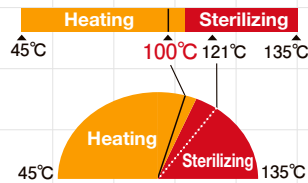
Pressure fine adjustment function
When the balance between the temperature and pressure deviates during sterilization, fine exhausting is carried out automatically in order to adjust the best chamber condition.

FUNCTIONS

- Liquid sterilizing
- Heating
- Warming
- Last-run memory
- Lid opening/closing detection mechanism
- Exhaust bottle detection mechanism

Timer function
The operation starting time can be preset easily. By presetting the start of operation, otherwise wasted periods at night or early morning, can be used effectively.

Lid interlock
A safety device （lid interlock mechanism） for locking the lid during operation is provided. A high level of safety is assured to prevent unanticipated accidents.

Water level detector
A safety device （water level detector） for preventing dry heating is provided. The device is designed to detect the water level through the micro electrolytes of the sterilizing water.

OPTION

External sensor for the articles to be sterilized
Sensor for directly detecting the temperature of articles to be sterilized. More reliable sterilization monitor can be carried out.

Data output
The temperature data, pressure data, etc. can be exported. The temperature can be recorded when the external recorder is connected.

External sensor and recorder
A temperature sensor and recorder independent of the autoclaves. The chamber temperature can be recorded.

Specifications

Model			SX-300	SX-500	SX-700
Operating temperature range	Sterilizing		105〜135℃（0.019MPa〜0.212MPa）		
	Heating		45〜104℃（0〜0.015MPa）		
	Warming		45〜95℃		
Maximum operating pressure			0.263MPa		0.25MPa
Temperature	Display		Digital		
Pressure gauge	Display		Analog		
	Display range		0〜0.4MPa		
Heat source			1.5 kW electric heater	2.0 kW electric heater	3.0kW electric heater
Safety device			・Water level sensor ・Current leakage breaker ・Lid interlock ・Over-heat prevention ・Over-pressure prevention ・Open temperature sensor detection ・Safety valve		
Time	Display		Digital		
	Setting range	Sterilizing	0:01〜9:59/1〜99 hours/1〜999 minutes/0:01〜9:59, 10〜99 hours (selectable)		
		Heating			
	Warming		1〜99 hours		
Chamber dimensions			φ325×553mm	φ325×733mm	φ370×774mm
Effective diameter × Effective depth			φ315×458mm	φ315×638mm	φ360×675mm
Chamber capacity			Internal volume of the chamber: 44 L	Internal volume of the chamber: 58 L	Internal volume of the chamber: 79 L
Chamber material			SUS304		
Dimensions (mm)			410W、477D、790H（With projection: 574 D）	410W、477D、970H（With projection: 574 D）	470W、528D、1003H（With projection: 625 D）
Weight			50kg	60kg	72kg
Rated voltage			120V AC		———
			230V AC		
Power input			13A/120V	17A/120V	———
			7A/230V	9A/230V	13A/230V
Required power supply			Single-phase 120 V AC（50/60 Hz）15 A or more	Single-phase 120 V AC （50/60 Hz）20A or more	———
			Single-phase 230 V AC（50/60 Hz）10 A or more	Single-phase 230 V AC （50/60 Hz）15A or more	Single-phase 230 V AC（50/60 Hz）15A or more
Power consumption (calorific power)			1.5kW (1290kcal/h)	2kW (1720kcal/h)	3kW (2580kcal/h)
Environmental Conditions			When operating the autoclave, observe the environmental conditions given below. Ambient temperature: 10 to 35℃ Atmospheric pressure: 860 to 1060hPa Relative humidity: 30 to 85% Maximum gradient: 2°		
Accessories			Stainless basket（φ300 x181 mm）1	Stainless baskets（φ300 x 181 mm）2	Stainless baskets（φ345×181mm）2
			Chamber bottom plate 1, Caster stoppers 4,Operation manual 1, Clear folder（for storing the operation manual）1, Screw（for attaching the clear folder）1, Digital Warranty Information 1, Inspection sheet 1		

Option / Accessories

Printer

Operating parameters, chamber temperature, chamber pressure, temperature for articles to be sterilized, and sterilization cycle process can be printed.

Temperature Sensor for Articles to be Sterilized

Directly detects the temperature for articles to be sterilized.

Stainless Basket　Stainless Bucket　Long Basket　Sterilizing Bag

Features

- Fine pressure adjustment function
- Ion detector for water level detection
- Microprocessor for controlling temperature
- Standard equipped cooling fan (2 fans)
- Variable exhaust speed (6 levels)
- Operation start timer
- Built-in exhaust bottle (polypropylene)
- Compact design
- Low working table
- Flat internal surface of the chamber
- Top-open lid
- Foot pedal to open lid
- Intuitive display with work monitor
- Operation indication lamp
- Liquid sterilizing course selectable