



Autoclaves for sterilization "Autester ST DRY PV III"

MICROPROCESSOR PROCESS CONTROL.
AUTOMATIC VACUUM DRY AND PURGE "PREVACUUM"
PROGRAMMABLE TEMPERATURE FROM 105 °C TO 134 °C (0.21 TO 2 bar).
CONFORMS TO APPARATUS PRESSURE REGULATION DIRECTIVES.
VERTICAL FLOOR STANDING MODEL: 50, 80 AND 150 LITRES.



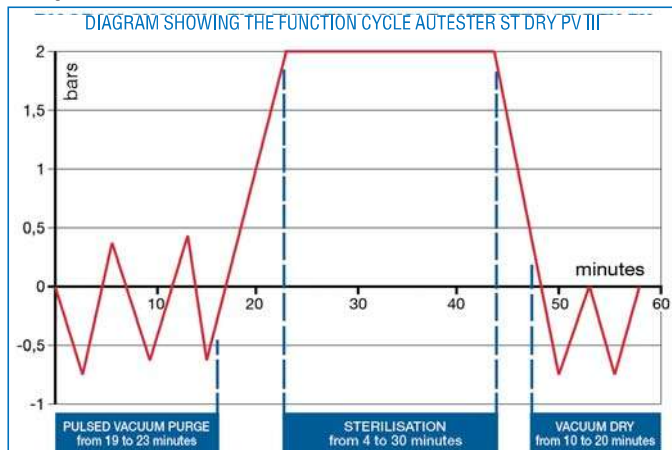
CONFORMITY	
EN 61010-1	SAFETY FOR EQUIPMENT FOR LABORATORY USE
EN 61010-2-040	SAFETY FOR STERILIZER EQUIPMENT FOR LABORATORY USE
EN 61326	ELECTROMAGNETIC COMPATIBILITY FOR EQUIPMENT FOR LABORATORY USE.

FEATURES

- Stainless steel exterior and top.
- Stainless steel lid.
- Lid, six closure point system.
- Pulsed vacuum system and atmosphere purge.
- Incorporated steam generator, connected to the main chamber.
- Water reservoir for clean water for the steam generator boiler.
- External water connection if required.
- 6 function modes.
- RS 232 for PC parameters printing (back side).
- Printer output.
- USB output for PEN-DRIVE data logging and Computer connection.
- Connection for a second temperature sensor.
- Memory for 9 customer set programs.

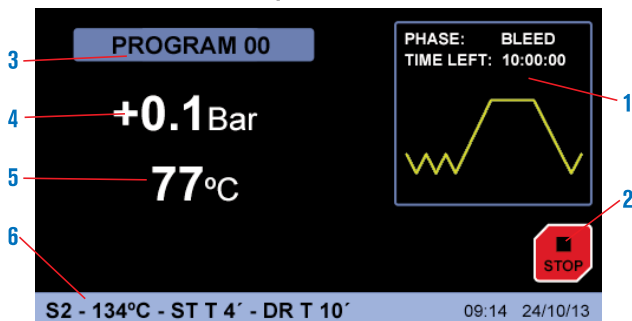
SAFETY

- Safety:** The lid cannot be opened if the chamber is under pressure.
- Safety valve:** Prevents over pressure over the maximum limit.
- Safety pressure switch:** switches the heater power off to if over pressure.
- Safety Lid:** insulated lid protection.

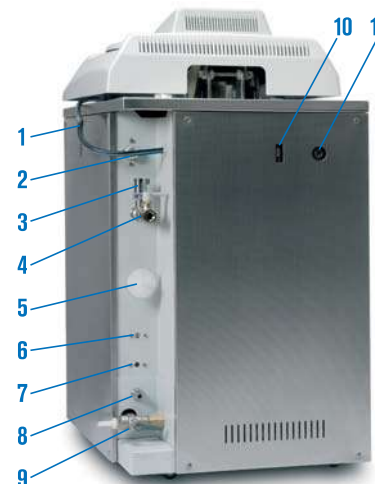


CONTROL PANEL

TFT touch screen with virtual pushbuttons.



- Graphical representation of real time process
- Start/Stop virtual pushbutton.
- Running program.
- Press indicator.
- Temperature indicator.
- Running program parameters.



BACK VIEW

- Mains input.
- External water supply.
- Safety valve.
- Vacuum vapour valve.
- Air in filter valve.
- Safety thermostat.
- Safety thermostat.
- Empty tank valve.
- Drain tank valve.
- RS232 connector.
- 2nd Temperature sensor connection.

MICROPROCESSOR FEATURES

The microprocessor controls the performing of the air extraction process, sterilizing and drying, executing the selected procedures and commands by the user, adjusting the following parameters:

- Sterilization temperature from 105°C up to 134°C.
- Sterilization time from 3' to 59'.
- Drying time from 20' to 60'.
- Up to 10 user-configurable programs.
- Six operating modes:
 - Solid 1 - Solid 2 fractions. - Solid 3 fractions -
 - Drying - Liquids - Liquids 2 probes
- Verification test
 - Vacuum - Bowie Dick.
- Settings:
 - Units - languages (Spanish, English, French).
 - USB or printer module. - Clock: date/time.
 - External water: on/off.
 - Password
- Calibration
 - Temperature probe 1 - Temperature probe 2
 - Water dosing.
- Audible and visual alarm for overtemperature and insufficient temperature.
- Network failures detection and memorization
- Safety thermostat by software
- Sterilization cycles data logging with capacity for over 500 cycles.
- Internal cleaning program
- Software for PC
- Temperature correction
- Summarized user manual on screen
- Graphical representation of real time process

Error messages of functions and program execution are displayed and an acoustic alarm sounds. The vapour generator automatically cuts out.

MESSAGES:

- | | |
|-----------------------|---------------------------|
| 1. E 2PROM | 10. TEMPERATURE LOW FAULT |
| 2. RTC FAULT | 11. INPUT ERROR |
| 3. SENSOR PRECISION | 12. STERILIZATION |
| 4. HEATER PROBE | 13. LEVEL 1 |
| 5. CHAMBER PROBE | 14. LEVEL 2 |
| 6. OVER PRESSURE | 15. DOOR |
| 7. VACUUM | 16. PRINTER NO PAPER |
| 8. PRESSURE | 17. PAPER JAM |
| 9. BOILER TEMPERATURE | 18. ELECTRICAL FAULT |



MODELS	Part No.	Dry	Capacity litres	Ø / Height (usables) cm	Height / Width / Depth (exterior) cm	Temp. °C	Water Reservoir H ₂ O capacity.	Basket size	Power W	Weight Kg
AUTESTER ST DRY PV III 50	4002516	Yes	50	30 63	117 48 62	105 to 134	10	3	3000	108
AUTESTER ST DRY PV III 80	4002517	Yes	80	40 60	107 58 72	105 to 134	10	2	4850	136
AUTESTER ST DRY PV III 150*	4002518	Yes	150	50 70	118 80 95	105 to 134	20	3	7500*	250

Comes without baskets and drums.

* The part number 4002426 due to its power rating is only manufactured for three phase 230V or 400V. Specify preference when ordering.

COMPLEMENTS: Factory fitted options.



Printer of continuous paper roll with print out of temperature, pressure, time and mode. Part No. **4002417**

Pt100 Sensor (See page 63).

Loading and unloading crane. Part No. **1002426** (see page 70).

ACCESSORIES: AISI 304 Stainless steel wire baskets and drums.

For Autester ST DRY PV-II 50, Part No: 4002515.

Capacity, 3 baskets Ø 25,5 and 20 cm. height. Part No: **1000495**

For Autester ST DRY PV-II 80, Part No: 4002425.

Capacity, 2 baskets Ø 36 and 28 cm. height. Part No: **1000496**

For Autester ST DRY PV-II 150, Part No: 4002426.

Capacity, 3 baskets Ø 44,5 and 22 cm. height. Part No: **1000780**

Sterilization drum made from AISI 304 stainless steel.

For Autester ST DRY PV-II 50, Part No: 4002515.

Capacity, 3 drum Ø 25 and 18 cm. height. Part No. **1002418**

For Autester ST DRY PV-II 80, Part No: 4002425.

Capacity, 2 drum Ø 35 and 27 cm. height. Part No. **1002419**

Detergent Bio-Sel. (see page 63)

Water distillation unit especially for autoclaves. (see page 63).

PARAMETERS AND PROGRAMS PRE INSTALLED IN THE AUTOCLAVE MICROPROCESSOR

(Note: All these parameters are adjustable by the user)

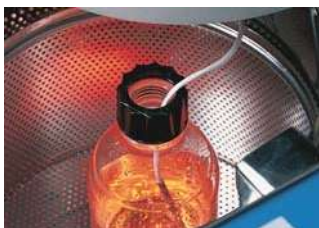
Nº Programme	Description	Temperature Sterilization	Time Sterilization	Time Dry	Purge
0	Free	-	-	-	-
1	Unwrapped instruments	134 °C	4 min	15 min	2 (1)
2	Wrapped instruments	134 °C	12 min	30 min	3 (2)
3	CJD	134 °C	20 min	20 min	3 (2)
4	Delicate unwrapped	121 °C	15 min	15 min	2 (1)
5	Delicate wrapped	121 °C	30 min	30 min	3 (2)
6	Disinfecting	105 °C	25 min	15 min	1 (3)
7	Liquids	121 °C	30 min	-	1 (3)
8	Solids	121 °C	15 min	30 min	1 (3)
9	Solids	134 °C	4 min	30 min	1 (3)

(1) Double Vacuum purge.

(2) Triple Vacuum purge.

(3) Atmospheric purge (No vacuum).

OPTIONS: for vertical autoclaves, need to be factory fitted.



Pt 100 Sensor. 2nd Probe for reading sample temperature.

To guarantee in all circumstances that the system has completed the cycle to the set time and temperature parameters, the Autester ST DRY PV II autoclave can be installed with a temperature probe that can be placed within the culture flask, residual packets etc.

When the probe is connected to the controller of the autoclave, it is automatically recognised by the micro-processor, whereby the real time temperature values detected by the probe, are displayed and printed.

For autoclaves PRESOCLAVE III this Pt100 sensor only reads the temperature with an external thermometer. Part No. **4001219**

Loading and unloading crane. Part No. **1002426** (see page 70).

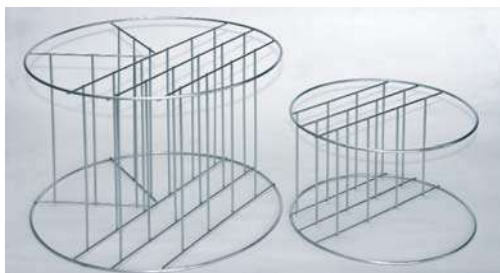
ACCESSORIES FOR VERTICAL AUTOCLAVES



AISI 304 stainless steel wire baskets.

Part No.	Ø	Height cm	Suitable for autoclaves Part No.	Number of baskets
1004771	22	14	4001745	1
1004772	22	24	4001756	1
1004771	22	14	4001757*	1
1004772	22	24	4001757*	1
1000495	27	20	4001758 - 4002516	3
1000496	36	28	4002136 - 4002517	2
1000780	44	22	4002518	3

Note:* For autoclave Part No. 4001757 supplied with 1 basket Part No. **1004771** + 1 basket Part No. **1004772**



AISI 316 stainless steel wire dividers for autoclave baskets.

Part No.

1001217 4 divider compartments for basket part no. 1000495.

1001218 6 divider compartments for basket part no. 1000496.

1001222 7 divider compartments for basket part no. 1000780.



Sterilization Drums.

Part No.	Ø	Height cm	Suitable for autoclaves Part No.	Capacity Drums
1002418	25	18	4001758 - 4002516	3
1002419	35	27	4002136 - 4002517	2
1002420	28	18	Not suitable for our autoclaves.	



Water distiller, specially for autoclaves "DEST-4".

Distillation capacity: 1.5 litres/hour. Internal capacity 4 litres.

Case made from thermo resistant plastic.

Internal stainless steel.

Cooling by forced air through a condenser. Without glass heater elements.

Easy to use. Safety cut out system if over temperature due to insufficient water.

Comes complete with a 4 litre three way dispenser plastic bottle with filter.

Note: for daily use it is recommended to change the filter every 3 months.

No
external
additional
water
required

Part No.	Capacity Distillation litre/Hour	Conductivity µs/cm	Ø	Height cm	Power W	Weight Kg
4001729	1.5	5	29	39	750	3.5

Spare: Dispenser spout with filter. Part No. **4001730**



Detergent "BIO-SEL"

We recommend the use of BIO-Sel detergent for cleaning, it is also biodegradable and free from Phosphates.

Part No.

1000025 Capacity 1 litre.

1000026 Capacity 4 litres.

1000852 Box of 12 x 1 litre flasks.

1000853 Box of 4 x 4 litre flasks.