HORIZONTAL FLOOR-STANDING AUTOCLAVES
150 - 1033 Liters

Engineering under high pressure
Made in Germany

ZIRBUS
TECHNOLOGY

SPECIAL DESIGN OF THE DEVICES

Our series models can be individually adapted to your local conditions. We design the devices according to schedule and space-saving according to your conditions and make optimal use of the available space.

Get in touch with us, we will be happy to help you.

HORIZONTAL FLOOR-STANDING AUTOCLAVES **SERIES 4** 150 - 305 Liter

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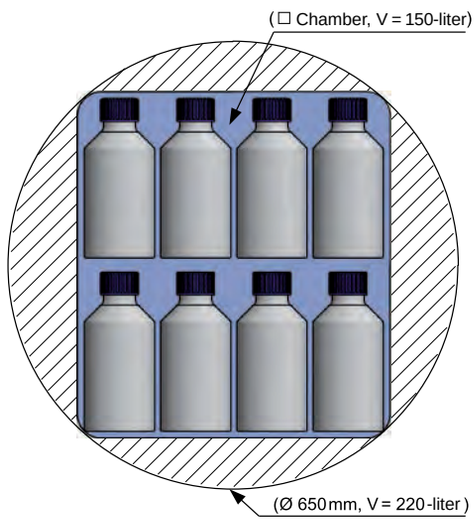


OPTIMAL USE OF LABORATORY SPACE

The usable volume of an angular chamber can – in contrast to a round chamber – be nearly completely utilized. As a result, the devices have smaller external dimensions.
Loading example:

48 x 1-liter Schott bottles:
☐ = 150-liter chamber capacity
◯ = 220-liter chamber capacity

MADE COMPLETELY OF STAINLESS STEEL

ANGULAR STERILIZATION CHAMBER, CHAMBER CAPACITY = USABLE CAPACITY

COMPACT DESIGN, ONLY 800 MM WIDE

VARIABLE INSERT RACK FOR FLEXIBLE USE

Technical data	HST 4 x 4 x 6	HST 4 x 6 x 6	HST 4 x 6 x 9
Dimensions in mm (W x H x D) 1-door	800 x 1950 x 1100	800 x 1950 x 1100	800 x 1950 x 1400
Pass-through model	980 x 1950 x 1050	980 x 1950 x 1050	980 x 1950 x 1350
Chamber capacity in liters	150	210	305
Free usable space in mm (W x H x D)	450 x 500 x 670	450 x 700 x 670	450 x 700 x 970

Closure system

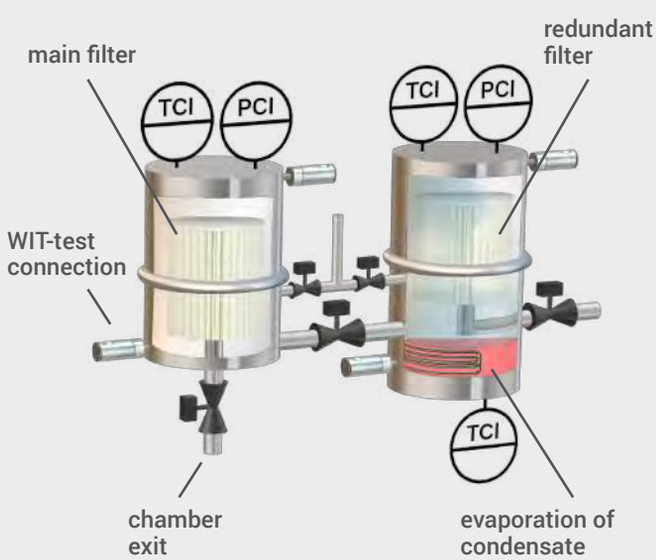
- The autoclave has a convenient and absolutely secure vertical door, including a fully automatic closure system.
- Safety bar with anti-pinch protection.
- Space-saving: No pivot space is needed in front of the device for the door.
- Low-maintenance door seal.

Transport and batch carts

- Ideal for easy loading and unloading of the chamber.
- Height of shelves can conveniently be adjusted or shelves can be completely removed.
- With docking device and locking mechanism for secure handling.
- Suitable for use in cleanrooms.
- Electrically height adjustable.

Exhaust air filtration with inline condensate sterilization

- For reliable sterilization of items harmful to health (S2 laboratory), the exhaust air is directed via an inline-sterilizable filter.
- For S3- / S4 laboratories we offer a double filter system according to the current ABAS decision.
- Method tested by the RKI and entered in the disinfection list, according to section 18 IfSG [Infection Protection Act].
- Sterile filter gas retention rate: 0.01 µm, mounted in the stainless steel housing, temperature-monitored, Inline sterilizable
- Floor of the chamber designed as a basin to collect the condensate for inline sterilization.



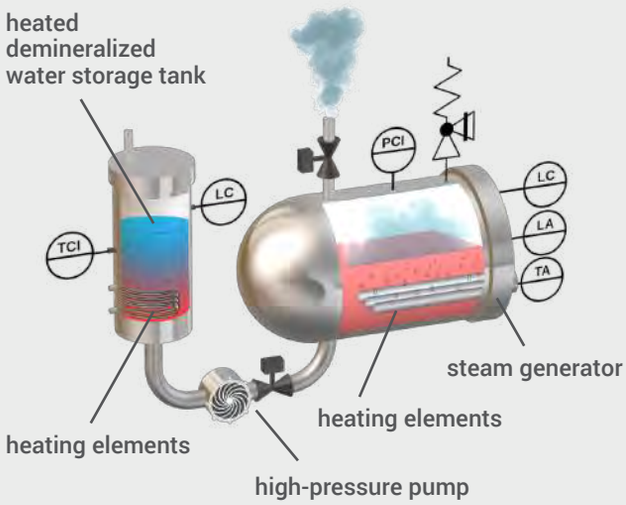
HORIZONTAL FLOOR-STANDING AUTOCLAVES **SERIES 6** 304 - 850 Liter

ZIRBUS TECHNOLOGY

- **CAN BE SUPPLIED AS A "PASS-THROUGH MODEL" WITH GASTIGHT PARTITION (BIOSEAL)**
- **ERGONOMIC LOADING HEIGHT OF 800 MM**
- **7-INCH TOUCH SCREEN CONTROL FOR INTUITIVE OPERATION**
- **HEIGHT-ADJUSTABLE TRANSPORT AND LOADING CART FOR EASY LOADING AND UNLOADING**

Technical data	6 x 6 x 6	6 x 6 x 9	6 x 6 x 12
Dimensions in mm (W x H x D) 1-door	980 x 1950 x 1100	980 x 1950 x 1400	980 x 1950 x 1700
Pass-through model	1250 x 1950 x 1050	1250 x 1950 x 1350	1250 x 1950 x 1650
Chamber capacity in liters	304	440	577
Free usable space in mm (W x H x D)	650 x 700 x 670	650 x 700 x 970	650 x 700 x 1270

Technical data	6 x 6 x 16	6 x 6 x 18
Dimensions in mm (W x H x D) 1-door	980 x 1950 x 2100	980 x 1950 x 2300
Pass-through model	1250 x 1950 x 2050	1250 x 1950 x 2250
Chamber capacity in liters	758	850
Free usable space in mm (W x H x D)	650 x 700 x 1670	650 x 700 x 1870

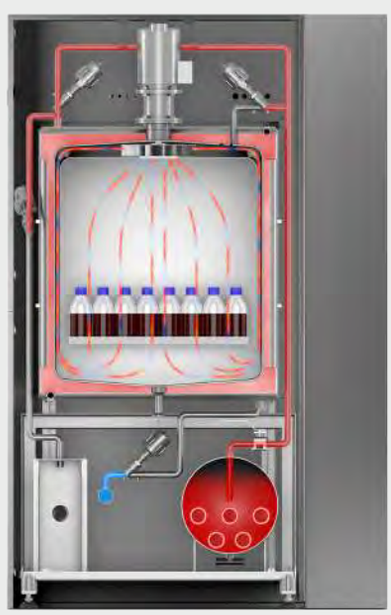


Steam generator

- Compact and high-performance, integrated in the autoclave.
- For avoiding non-condensable gases (NCG) with heated demineralized water tank.
- The water level control is performed by means of a wear-resistant level sensor, independent of conductivity.
- Energy-efficient, optimally insulated low heat radiation.
- Optimal ratio of the amount of water and heating power. For optimal steam quality and short heating times.

Air-circulating fan

- For further optimization of the rapid water cooling as well as for shortening the process time.
- Power transmission by means of wear-resistant magnetic coupling.
- For use in the steam/air mixture method (DLGV) – even temperature distribution.
- Does not restrict the usable chamber space.
- Air deflectors for optimal flow and temperature distribution.



GMP design according to DIN 58950

- Dead-space-free design of all pipes and valves connected to the product space.
- Pipes made of material no. 1.4404, pipe class H3.
- Diaphragm valves made of material no. 1.4435, precision casting.
- Interior chamber surfaces sanded and electro-chemically polished (Ra < 0.8 µm, optionally Ra 0.4 µm).
- Piping system according to the 3D rule.

HORIZONTAL FLOOR-STANDING AUTOCLAVES **SERIES 8** 370 - 1033 Liter

ZIRBUS TECHNOLOGY

USABLE CHAMBER HEIGHT OF 850 MM, IDEAL FOR FERMENTERS

NARROW WIDTH OF 1300 MM THANKS TO THE VERTICAL DOOR

OPTIMAL RATIO BETWEEN CHAMBER CAPACITY AND FOOTPRINT

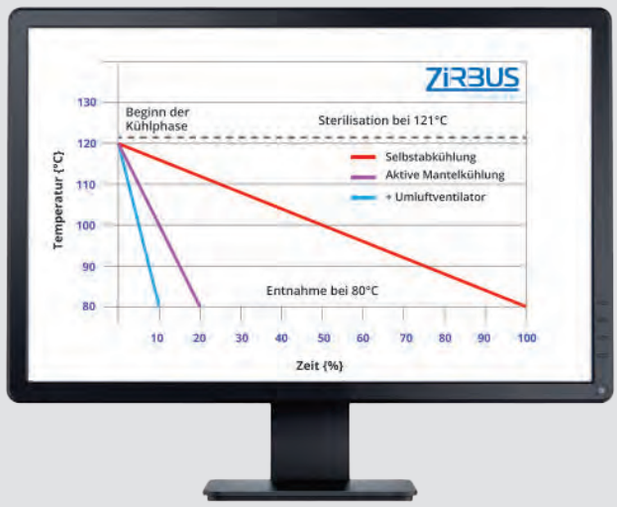
STAINLESS-STEEL PNEUMATIC VALVES AND STEAM PIPES

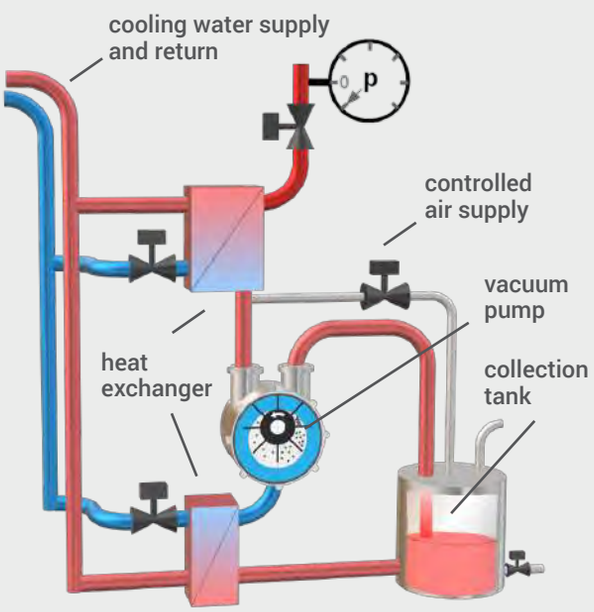
Technical data	8 x 6 x 6	8 x 6 x 9	8 x 6 x 12
Dimensions in mm (W x H x D) 1-door	1300 x 2300 x 1100	1300 x 2300 x 1400	1300 x 2300 x 1650
Pass-through model	1300 x 2300 x 1050	1300 x 2300 x 1350	1300 x 2300 x 1650
Chamber capacity in liters	370	535	700
Free usable space in mm (W x H x D)	650 x 850 x 670	650 x 850 x 970	650 x 850 x 1270

Technical data	8 x 6 x 16	8 x 6 x 18
Dimensions in mm (W x H x D) 1-door	1300 x 2300 x 1850	1300 x 2300 x 2300
Pass-through model	1300 x 2300 x 2050	1300 x 2300 x 2250
Chamber capacity in liters	812	1033
Free usable space in mm (W x H x D)	650 x 850 x 1470	650 x 850 x 1870

Rapid water recooling

- Shortening of the recooling time by up to 80% in comparison to self-cooling.
- Ideal for optimal use of the autoclave. Several cycles in the liquid program are possible per day.
- Support pressure regulation via sterile air filter.
- A connection to the in-house cooling circuit for water conservation can be optionally supplied.





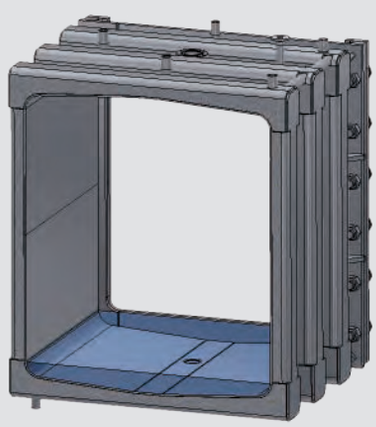
High-performance vacuum pump

- For complete ventilation of the sterile material for a sterilization which can be validated. Steam can reliably penetrate only where there is no residual air.

  Possible methods:
  · VOVV: Single-stage prevacuum, e.g. for liquids and glassware.
  · FRVV: Multi-stage prevacuum, e.g. for waste materials in destruction bags.
- Simple and fractionated vacuum.
- Drying in the vacuum is fast and effective, supported by jacket heating.
- A connection to the in-house cooling circuit can be optionally supplied.
- Low noise operation.

Hygiene-design

- For complete emptying, the floor of the chamber is sloped toward the drain.
- The floor of the chamber is designed as a reservoir to collect any condensate present during the waste material sterilization and sterilize it “inline.”
- Rounded corners enable easy cleaning.
- Chamber walls made of high-quality CrNiMo steel, material no. 1.4404 (AISI 316 L); circumferential double mantle made of CrNiMoTi steel, material no. 1.4571 (AISI 316 Ti).



HORIZONTAL- FLOOR- STANDING AUTOCLAVES **WITH ROUND CHAMBER** 295 - 825 Liter

ZIRBUS TECHNOLOGY

COST EFFECTIVE ALTERNATIVE TO THE ANGULAR CHAMBER

LOW LOADING HEIGHT

LOW MEDIA REQUIREMENTS

SHORT PROCESS TIMES

Technical data	LabStar 295	LabStar 430	LabStar 560	LabStar 825
Dimensions in mm (W x H x D)	950 x 1750 x 1168	950 x 1750 x 1468	950 x 1750 x 1768	950 x 1750 x 2368
Chamber capacity in Liters	295	430	560	825
Free usable space in mm (Ø x D)	750 x 670	750 x 970	750 x 1270	750 x 1870