Leader laminated glass production line LD-A2550

(Glass autoclave for PVB/EVA/TPU/SGP laminated glass)

With the glass laminating production line, Occupation the safety glass market!



I)Leader autoclave functions and composition

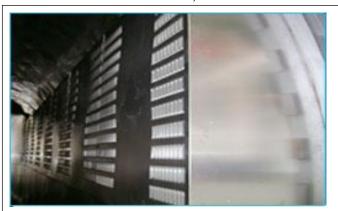
Autoclave is the key equipment for laminated glass production, through heating, pressurizing, cooling and others processes, laminated glass securely glued together. Equipped with the heating & cooling &control system, including the autoclave body insulation.

Executive standard: GB/T150.2011; customized according to customer requirements, details according to the agreed technical details, technical details and contracts have the same legal effect; quality assurance period is one year from the date of delivery of the equipment.

- 1. Autoclave body: 16MnR material for pressure vessel is selected. It is designed and manufactured in full accordance with the GB150-2011 "Steel Pressure Vessel" standard, and 90% radiographic flaw detection of welds of pressurized parts. Designed to have a service life of 15 years.
- 2. Sealing head: Both the toothed flange and the ellipsoidal sealing head are made of integral forgings, and the thickness is greater than the thickness of the autoclave.
- 3. Autoclave door: the hydraulic cylinder is used to open the door on one side (left), which can be automatically closed and locked. The degree of automation of the equipment is improved.
- 4. Heating element: stainless steel heating pipe, heating element evenly distributed on both sides and rear of the autoclave, forced convection to ensure the uniformity of the temperature before and after the autoclave in the heating process, and at the same time shorten the heating time, to achieve the purpose of energy saving.
- 5. Thermal insulation material: aluminum silicate rock wool is used for internal thermal insulation, and its thermal insulation performance is better than that of traditional rock wool; It makes it difficult to lose heat in the autoclave, especially in the heat preservation stage, which can keep the temperature constant, and ensure the quality and yield of processed products. In addition, the outer part of the insulation layer is fixed and sealed with stainless steel plate, which not only increases the aesthetics, but also plays a role in anti-rust and anti-fouling functions.
- 6. Cooling system: double hot-dip galvanized seamless pipes are distributed on both sides and top of the

autoclave as coolers, with high heat exchange efficiency and large heat dissipation area.

- 7. Control system: Equipped with PLC system, using color touch screen to operate, the whole process can realize automatic operation; in the process of work, the pressure and temperature curve are displayed at any time, and there is a paperless record function, which can complete the recording of the process curve and process parameters; in the process of heating and pressure raising, there is a temperature and other pressure, pressure and other temperature control programs, in order to ensure that the temperature and pressure are synchronized according to the set process curve, in the process of constant temperature and pressure, there is automatic temperature supplement, pressure control.
- 8. Safety interlocking system: the autoclave body is equipped with a mechanical safety interlocking device, and the program is also set with a safety interlocking program, which can not be opened when there is pressure in the autoclave, automatic alarm for overtemperature and overpressure, automatic cooling for overtemperature and automatic pressure relief for overpressure, so as to ensure the safety of operation to the greatest extent.
- II) Leader autoclave main technical characteristics
- 1. Save energy: The power consumption is lower than the normal autoclave, can save energy 30%, The processing time is short and efficiency high.
- 2 Fire Proofing: Process according the Leaders operation rules. Using the separate material could avoid the fire.
- 3. Efficiency: Leaders autoclave is more efficiency than the normal autoclave.
- 4. Clean: No pollution, noise free, smoke –free, process the laminated glass in good environment.
- 5. Strong: the sealed doors, cooling, autoclave doors and other parts of machine failure maintenance rate lower 90% than other furnace, PLC-touch screen control, easy to operate.





Specific parameter configuration:

- ①Process max laminated glass length: 5000 mm,width: 2500mm; minimum glass dimension: 350*350mm
- ②The autoclave design pressure: 1.58MPa, working pressure: 1.35 MPa, opening pressure of the safety valve: 1.4 MPa
- The autoclave design temperature: 160°C, working temperature: 140°C
- Working medium: compressed air; Heating method: automatic heating, uniform temperature of the fan; Heat transfer mode: fan stirring
- ⑤The autoclave inside railway distance: 900mm (Could according to the customer requirements manufacture)
- ⑥Insulation: thermal insulation, the thickness 80mm



- The door open method: oil pressure, left (facing the autoclave door left open) or could according the request design right hand door
- ®Working power supply: 3P 380V 50HZ.;total power: 190KW (Including the pre-press machine and screw compressor) (energy-saving)
- The space area: 35000*5000*5000mm (L*W*H)
- ①The terminal post is installed on the autoclave, and the heating element is connected with a high-temperature wire and the binding post)



- 1. Remark: Buyers could put down the exhaust pipe into the sewer and level emissions also could buy the simple silencer from the seller.
- 2 Buyers conditional ions circulating water to cool the autoclave, or retrofitted with high magnetic anti-fouling device.
- 3. Need built a 20 CBM cooling pools for cool the laminated glass.
- III)、Control systems features and security protect system.





- 1. Equipped with two sets of system, manual system and automatic system, parameter setting, full automatic work. Can be turned to manually operating system
- 2. Adjustable control systems, users can adjust the glass processing parameters according the actual glass thickness and quantity.
- 3. Equipped with the manual and mechanical safety valve chain. ensure gas can't open the door, after the overpressure relief valve automatic exhaust.
- 4. Equipped with a chain, pressure sensors detect reactor pressure is automatically opened the motor power supply. Ensure that unconfined after the overpressure of transmission over temperature solenoid valve automatic venting.
- 5. When the gear at the correct position, and then could begin work.

V. Main material for the autoclave:

The autoclave doors: 16Mn forge piece.

The autoclave body: Q345H

The heating spare parts: medium wave infrared heating tube.

The sealed system: silicon sealed ring.

Insulation material: rock wool and aluminum silicate.

NO	ITEM	UNIT	LD-A2550
1	Inner Diameter	mm	2600
2	Effective length	mm	5100
3	Max glass size	mm	2500X5000
4	Design Pressure	Мра	1.5
5	Design temperature	$^{\circ}$ C	160
6	Working pressure	Мра	1.3
7	Working temperature	$^{\circ}$ C	135
8	Starting pressure of safety valve	Мра	1.4
9	Working Media	/	Compressed air
10	Autoclave track distance	mm	900
11	Total power	KW	200
12	Door opening mode	1	Oil pressure
13	Heating mode/ elements	1	Radiate +Convent
14	Control mode	1	PLC+touch screen
15	Cooling mode	1	Water cooling
16	Temperature pressure technique software	1	SCR control software

Our PVB/TPU/SGP/EVA laminated glass production line advantage with others suppliers.

1) Heating system is different. We adopt Nickel-chromium alloy as the heating wire. The heating wire is 10 times life time longer than others.

Inside the furnace we designed with air blower. That will make the furnace temperature more equal and heating high efficiency.











2) More safe. We are the professional manufacturer in china. Each step we control the quality serious. Our machine with pressure with protection system. That guarantee the pressure according the request in the furnace. Not less not too much.





The machine could adopt the TPU /PVB /SGP/ EVA film laminating. Could choose the vacuum and pressure double function.

The autoclave is a special container. When making the furnace each step is very important. We pay attention to the details. And design the furnace safety and save energy.



Work shop

















Glass Exhibition:

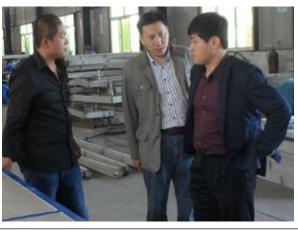
















Safety laminated glass





Hope to have chance to enter business with your company! Yours faithfully

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