

ETHYLENE OXIDE STERILIZER

INTRODUCTION MANUAL



INTERNATIONAL MARKET:
HANGZHOU BOCON MECHANICAL & ELECTRICAL EQUIPMENT CO.,LTD
ADDRESS:
ROOM1202, CAITONG ZHONGXIN, XIASHA DISTRICT, HANGZHOU CITY, ZHEJIANG PROVINCE, CHINA
TEL: 086-571-87977377
CELL: +86 18158114897
E-MAIL: NANCY.HUANG@HZBOCON.COM
WECHET: 18158114897
WEBSITE:
HTTP: //HZBOCON.EN.ALIBABA.COM
HTTP: //WWW.HZBOCON.COM

AFTER-SALE SERVICE :
ZHEJIANG BOCON INTELLIGENT EQUIPMENT CO.,LTD
ADDRESS:
BUILDING 6, NO. 2699 KEJI AVENUE, LUOXING STREET, JIASHAN COUNTY, JIAXING, ZHEJIANG PROVINCE
CELL: +86 15306590288
E-MAIL: TECHNICSUPPORT@HZBOCON.COM
WECHET: +86 15306590288
WEBSITE:
HTTP: //HZBOCON.EN.ALIBABA.COM
HTTP: //WWW.HZBOCON.COM



HANGZHOU BOCON MECHANICAL
ZHEJIANG BOCON INTELLIGENT

HANGZHOU BOCON MECHANICAL & ELECTRICAL EQUIPMENT CO.,LTD
ZHEJIANG BOCON INTELLIGENT EQUIPMENT CO.,LTD



企业简介 02

COMPANY PROFILE

Hangzhou Bocon Mechanical and Electrical Equipment Co., Ltd. was established in 2006, located in Hangzhou, Zhejiang Province, specializes in the research, development, manufacturing, and installation of sterilization equipment. We also provide comprehensive sterilization solutions and MES systems for sterilization stations. With nearly 20 years of sterilization experience and technical expertise, we are dedicated to delivering high-quality, reliable Ethylene oxide sterilizers and associated facilities to our global clients. Our ethylene oxide sterilizer and related equipment with hot water circulation and hot air circulation heating methods use advanced and fully functional control systems to achieve automatic control. Has parameter release function in accordance with ISO 11135. The product undergoes strict quality control and testing to ensure compliance with international requirements such as ISO13485 and EN 1422.

In addition to ethylene oxide sterilizers, we offer a range of ancillary equipment, including precondition rooms, aeration rooms, EO gas scrubbers, and pioneering EO gas recovery and energy recovery technologies. To date, our ethylene oxide sterilizers have been sold to 36 countries around the globe. With the continuous expansion of our business and production facilities, we established Zhejiang Bocon Intelligent Equipment Co., Ltd. in 2022. As a company that values integrity and exceptional service, we are eager to establish long-term partnerships with domestic and international clients for mutual growth. We invite you to contact us for more information about our ethylene oxide sterilizer.

VOLUME	PALLET QTY* SIZE(mm)	INTERNAL SIZE (mm)	OUTER SIZE (mm) (SLIDING DOOR)	OUTER SIZE (mm) (REVOLVING DOOR)	OUTER SIZE (mm) (LIFTING DOOR)
1m ³	//////	1400*700*1000	1750*1270*1520	//////	//////
2m ³	//////	1650*1000*1200	2070*2520*1720	2000*1570*1720	//////
3.0m ³	1*(1200*1000)	1400*1350*1700	1820*3220*2220	1750*1920*2220	1820*1910*3950
4.5m ³	2*(1200*800)	2000*1350*1700	2420*3220*2220	2350*1920*2220	2420*1910*3950
5m ³	2*(1200*1000)	2250*1350*1700	2670*3220*2220	2600*1920*2220	2670*1910*3950
6m ³	3*(1200*800)	2700*1350*1700	2670*3220*2220	2600*1920*2220	2670*1910*3950
8m ³	3*(1200*1000)	3500*1350*1700	3920*3220*2220	3850*1920*2220	3920*1910*3950
10m ³	4*(1200*1000)	4500*1350*1700	4920*3220*2220	4850*1920*2220	4920*1910*3950
	5*(1200*800)				
15m ³	5*(1200*1000)	5500*1350*2000	5920*3220*2520	5850*1920*2520	5920*1910*4550
	6*(1200*800)				
20m ³	7*(1200*1000)	7500*1350*2000	7920*3220*2520	7850*1920*2520	7920*1910*4550
26m ³	9*(1200*1000)	9600*1350*2000	10020*3220*2520	9950*1920*2520	10020*1910*4550
	11*(1200*800)				
28m ³	10*(1250*1220)	12500*1350*1700	12945*3220*2270	//////	//////
30m ³	13*(1200*800)	11300*1350*2000	11720*3220*2520	11650*1920*2520	11720*1910*4550
30m ³ -2	10*(1200*1000)	5600*2700*2000	6020*5920*2520	5950*3270*2520	6020*3260*4550
35m ³	15*(1200*800)	13000*1350*2000	13420*3220*2520	13550*1920*2520	13420*1910*4550
35m ³ -2	14*(1200*800)	6000*2700*2200	6470*6180*2780	6470*3410*2780	6470*3340*5070
40m ³ -2	12*(1200*1000)	6650*2700*2200	7110*6260*2780	7110*3450*2780	7110*3380*5130
48m ³	12*(1200*1000)	12850*1400*2700	13270*3480*3270	13200*2050*3220	13270*2040*6070
52m ³	13*(1200*1000)	13900*1400*2700	14320*3320*3220	14250*1970*3220	14320*1960*5950
55m ³ -2	14*(1200*1000)	7500*2700*2700	7960*6260*3280	7960*3450*3280	7960*3380*6130
57m ³ -2	18*(1200*1000)	9650*2700*2200	10110*6260*2780	10110*3450*2780	10110*3380*5130
63m ³ -2	16*(1200*1000)	8650*2700*2700	9110*6260*3280	9110*3450*3280	9110*3380*6130
70m ³ -2	18*(1200*1000)	9700*2700*2700	10160*6260*3280	10160*3450*3280	10160*3380*6130
78m ³ -2	20*(1200*1000)	10750*2700*2700	11210*6260*3280	11210*3450*3280	11210*3380*6130
86m ³ -2	22*(1200*1000)	11800*2700*2700	12260*6180*3280	12260*3410*3280	12260*3340*6070
101m ³ -2	32*(1200*1000)	17050*2700*2200	17510*3300*2780	17510*3300*2780	17510*3300*5070
120m ³ -2	38*(1200*1000)	20200*2700*2200	20660*6180*2780	20660*3450*2780	20660*3380*5070

产品尺寸 01

PRODUCT DIMENSIONS



01. Medical supplies: syringe, infusion device, dressing type, blood collection, intubation catheter, birth control equipment, Surgical Suture, etc.



02. Medical Devices: Endoscope, pacemaker, artificial heart, dialyzer, attractor oxygenator, etc.



03. Sanitary products: Women's sanitary napkin, napkin, disposable sanitary tableware, etc.



04. Medicine or Cosmetics: Some Chinese medicine, Western medicine, some cosmetics, etc.



05. Textiles & Biological Products: Cotton, wool, chemical fiber clothing, carpet, leather, fur products, etc.



06. Valuables: Paper money, ticket, medical records, archives, letters, collection of historical relics, silk satin products, animal specimens, etc.



07. Spices: dried herbs and spices, etc.



Advantages of Ethylene Oxide Sterilization

1. Ethylene oxide can be used for sterilization of items not resistant to high temperature and humidity.
2. Ethylene oxide is considered to be a chemical sterilant with a good sterilization effect, which can kill all microorganisms including bacterial spores.
3. It has strong penetrability and can be used for sterilization of parts that are difficult to penetrate: some thin and long conduits cannot be sterilized by other low-temperature sterilization methods, and can only be sterilized by ethylene oxide or irradiation.
4. It causes little damage to items because ethylene oxide kills microorganisms by alkylation rather than oxidation, so it is very suitable for sterilization of items not resistant to heat.
5. It can be packed with various packing materials for storage and transportation, which can avoid cross-contamination.
6. It has standard chemical and biological monitoring methods so that sterilization quality can be effectively controlled and packages with failed sterilization can be found in time.

灭菌柜各系列控制系统功能清单列表 The series sterilizer control system functions list					
序号 Item	功能 Function	Be系列 BE Series	Le系列 LE Series	Ge系列 GE Series	He系列 HE Series
1	柜内温度 (T1)/ Cabinet inside Temperature (T1)	√	√	√	√
2	柜内温度 (T2)/ Cabinet inside Temperature (T2)	√	√	√	√
3	柜内压力 (P1)/ Cabinet inside Pressure (P1)	√	√	√	√
4	柜内压力 (P2)/ Cabinet inside Pressure (P2)		√	√	√
5	柜内湿度 (RH1)/ Cabinet inside Humidity (RH1)	√	√	√	√
6	柜内湿度 (RH2)/ Cabinet inside Humidity (RH2)			√	√
7	水箱温度 (T5)/ Tank Temperature (T5)	√	√	√	√
8	Eo温度 (T6)/ EO Temperature (T6)	√	√	√	√
9	汽化器温度 (T7)/ Vaporizer Temperature (T7)	√	√	√	√
10	磁力风机轴承温度 (T8)/ Magnetic Fan Bearing Temperature(T8)			■*1	■*1
11	磁力风机轴承温度 (T82)/ Magnetic Fan Bearing Temperature(T82)			■*1	■*1
12	磁力风机转速 (SPD1)/ Magnetic Fan Speed (SPD1)			■*1	■*1
13	磁力风机转速 (SPD2)/ Magnetic Fan Speed (SPD2)			■*1	■*1
14	磁力风机流量 (FL1)/ Magnetic wind turbine flow (FL1)"			■*1	■*1
15	磁力风机流量 (FL2)/ Magnetic Fan Flow (FL2)			■*1	■*1
16	柜内温度 T3/ Cabinet inside Temperature T3			■*2	■*2
17	放空温度 T9/ Venting Temperature T9			■*3	■*3
18	放空加热器 T10 / Venting Heater T10			■*3	■*3
19	恒量真空功能/ Constant Vacuumizing		□*3	■*3	■*3
20	恒量放空功能/ Constant Venting			■*3	■*3
21	恒量加药功能/ Constant Feeding EO			■*3	■*3
22	恒量加N2功能/ Constant Adding N2			■*3	■*3
23	蒸汽发生器软控功能/ Vaporizer Remote Control		□	√	√
24	内循环风机/ Internal Circulation Fan			□	□
25	无害排风功能/ Harmless Exhausting		□	√	√

BE Series LE Series GE Series HE Series

灭菌柜各系列控制系统功能清单列表 The series sterilizer control system functions list					
序号 Item	功能 Function	Be系列 BE Series	Le系列 LE Series	Ge系列 GE Series	He系列 HE Series
26	汽化加热水箱/Vaporizing heating(water) tank			□	□
27	全程氮气保护功能/Nitrogen Protection		□*4	■*4	■*4
28	阀门气源压力检测功能/Valve Air Pressure Detection	√	√	√	√
29	门封气源压力检测功能/Door Seal Air Pressure Detection		√	√	√
30	进料门门封压力足检测功能/Loading Door Seal Pressure Sufficient Detection		□	√	√
31	出料门门封压力足检测功能/Unloading door seal pressure sufficient detection		□	√	√
32	蒸汽压力足检测功能/Sufficient Steam Pressure Detection	□	□	√	√
33	真空泵缺水检测功能/Vacuum pump water-shortage detection function	□	□	√	√
34	阀门位置反馈/Valve position feedback device			√	√
35	尾气处理命令输出功能/Tail Gas Removing Command	√	√	√	√
36	尾气处理应答反馈功能/Tail Gas Removing Feedback	√	√	√	√
37	防雷功能/Lightning protection			□	■
38	工控机/IPC		√	√	√
39	和物料管理系统联网功能/MES connect function		√	√	√
40	触摸屏或文本显示屏/Touch Screen or Text Screen	√	□	□	√
41	UPS/电源/UPS		√	√	√
42	现地数据控制箱/Local Data Control Box	√	√	√	√
43	英文版/English Version	√	√	√	√
44	厂商软件验证报告/Factory Software Verification Report		√*5	√	√
45	控制系统历史数据曲线图/Control System Historical Data Graph		√	√	√
46	控制系统详细数据报表/Control Systems Detailed Data Report	√	√	√	√
47	控制系统详细数据自动汇总/Control System Detailed Data Auto-summary		√*6	√*6	√*6
48	控制系统产品清单表/Control System Components List Sheet		√	√	√
49	控制系统数据物联网接口/Control system Data IOT Interfaces		□	√	√
50	控制系统物料管理系统接口/Control System Material Management System Interface		√	√	√
51	服务器/Server			√*7	√*7
52	整机质保年限/Equipment Warranty Period1	1*8	1*8	2*8	3*6

BE Series LE Series GE Series HE Series

- 说明 NOTICE: √--- 标配有此功能 standard configuration □--- 免费可选功能 optional function - free
 □--- 收费可选功能 optional function - extra charges ■--- 待开发功能 function to be developed
- *1 有内循环风机时, 此功能为标配; Only when the equipments have the internal circulation fan □ this feature is standard configuration.
 - *2 只有柜体尺寸≥50m³时才有此功能可选; Only the equipments, which has the cabinet size ≥50m³, have this optional function
 - *3 系统配置有变频器或对应的控制比例阀时才有此功能可选; Only the equipment, which is configured with frequency converter or control valve, has this optional function.
 - *4 必须具有氮气阀和氮气设备时才有此功能可选; Only the equipment, which has a nitrogen valve and nitrogen making device, has this optional feature.
 - *5 标准化版本可以免费提供, 定制化版本需要额外收费; Free provided for standard sterilizer; Customized will charge separately.
 - *6 查看不同系列标准化汇总格式表; Check the different series of standardized summary sheet
 - *7 此配置需要看具体情况, 一般默认请情况为下柜体>35m³, 即会赠送服务器; It's according to the size of the sterilizer, the server will be free for all of the sterilizer size over 35m³.
 - *8 具有独立型号的标准产品上如果有独立的质保年限标志时, 按照标准产品的自有质保年限质保条约执行; If the standard models of equipments has their independent warranty period, its own standard product warranty period has the priority.
 - *9 控制系统质保2年, 其他设备质保1年。Control system guarantee period is 2 years, others 1 year.

柜门分类 05

DOOR CATEGORIES



Model	BCS-78	BCS-138	BCS-238	BCS-238D	BCS-600	BCS-900
Appearance dimension (L*W*H)mm	930*730*1400	930*880*1470	1010*1080*1520	1010*1080*1520	1300*1000*1850	1300*1450*1850
Internal chamber dimension (L*W*H)mm	610*420*300	840*430*380	950*500*500	950*500*500	860*700*1000	1290*700*1000
Internal chamber capacity	78L	138L	238L	238L	600L	900L
Power supply	220V(200V); 50(60)HZ					
Power (KW)	1.4	2.3	3.4	3.4	7.5	10
Internal material	SUS304	SUS304	SUS304	SUS304	SUS304	SUS304
Water storage capacity in the humidification	1 L	5 L	5 L	5 L	5 L	5 L
Exhaust mode	Direct exhaust					
	Floor drain					
Weight(KG)	230	270	320	340	800	1000
Sterilization pressure(Kpa)	-80	-80	-80	-80	-80	-80
Sterilization humidity	40%-80%	40%-80%	40%-80%	40%-80%	40%-80%	40%-80%
Sterilization cycle (total)	55°C: 8-10hours	55°C: 8-10hours	55°C: 8-12hours	55°C: 8-12hours	55°C: 10-15hours	55°C: 10-15hours
	37°C: 10-12hours	37°C: 10-12hours	37°C: 10-14hours	37°C: 10-14hours	37°C: 15-20hours	37°C: 15-20hours
Aeration time	37°C 4hours	37°C 4hours	37°C-4hours	37°C-4	37°C-6hours	37°C-6hours
	55°C-1hour	55°C-1hour	55°C-1hour	55°C-1hour	55°C-4hours	55°C-4hours
Loading mode			Vehicle	Vehicle	Vehicle	Vehicle
Print type	Number/Figure	Number/Figure	Number/Figure	Number/Figure	Number/Figure	Number/Figure
EO cartridge	70g	100g	170g	170g	180g*2	180g*3



PNEUMATIC SLIDING DOOR



PNEUMATIC REVOLVING DOOR



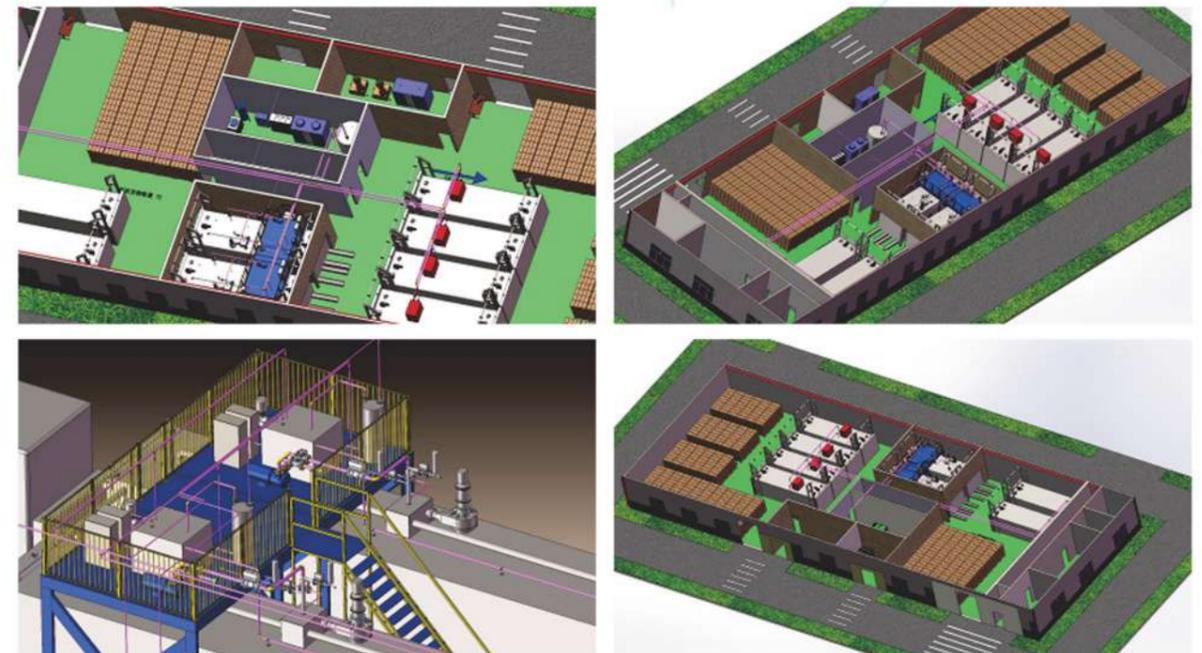
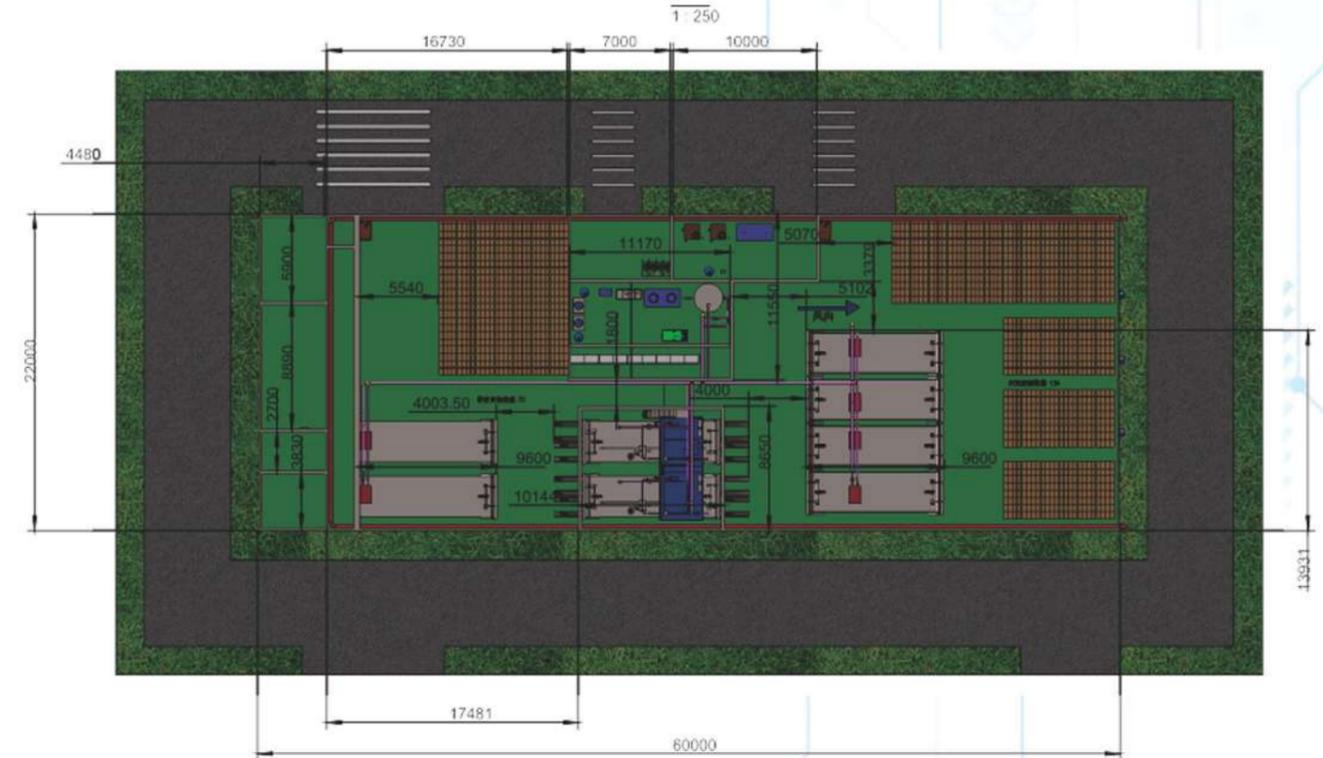
OVERALL LIFTING DOOR

建站设计 06

DESIGN STERILIZER STATION

	Advantages	Disadvantages
Pneumatic Sliding Door Eto Sterilizer	<ol style="list-style-type: none"> 1. Pneumatic sliding door uses the inflatable seal, The seal way is more convenient and reliable. 2. Pneumatic sliding door is automatically controlled by cylinders, it's safe and reliable. without manual applying an external switch; 3. Pneumatic sliding door is the most commonly used door control mode at home and abroad. 	<p>The biggest drawback is taking up a certain level of space, it's not suitable for the space-constrained occasions.</p>
Pneumatic Revolving Door Eto Sterilizer	<ol style="list-style-type: none"> 1. Pneumatic revolving door is actually the door with semi-inflatable seal, it's a popular way at home and abroad. A cylinder is used to top up the door 100-200mm higher, so the door separates from the door groove, then it can be open and close manually. It's suitable for large volume equipment. 2. Pneumatic revolving door is simple in structure, it's safe and reliable. It's suitable for space limited on left and right or top and bottom. 3. Pneumatic revolving door's sealing way is inflatable seal. It's easy convenient and reliable. 	<p>The Disadvantages is need human being help to open and close the door.</p>
Overall Lifting Door Eto Sterilizer	<ol style="list-style-type: none"> 1. The overall lifting door is explosion-proof electric lifting door. it's rising the overall door to the top or lowering it to the bottom. It's the most space-saving way. it's full automatic way, does not need any help to open or close. 2. Overall lifting door is also used inflatable sealing method. It's safe and reliable; 3. The overall lifting door is suitable for any cabinet volume. 	<p>The disadvantage is the cost is high because many security measures have to be added.</p>

The advantages and disadvantages of various doors for sterilizers



柜门分类 05

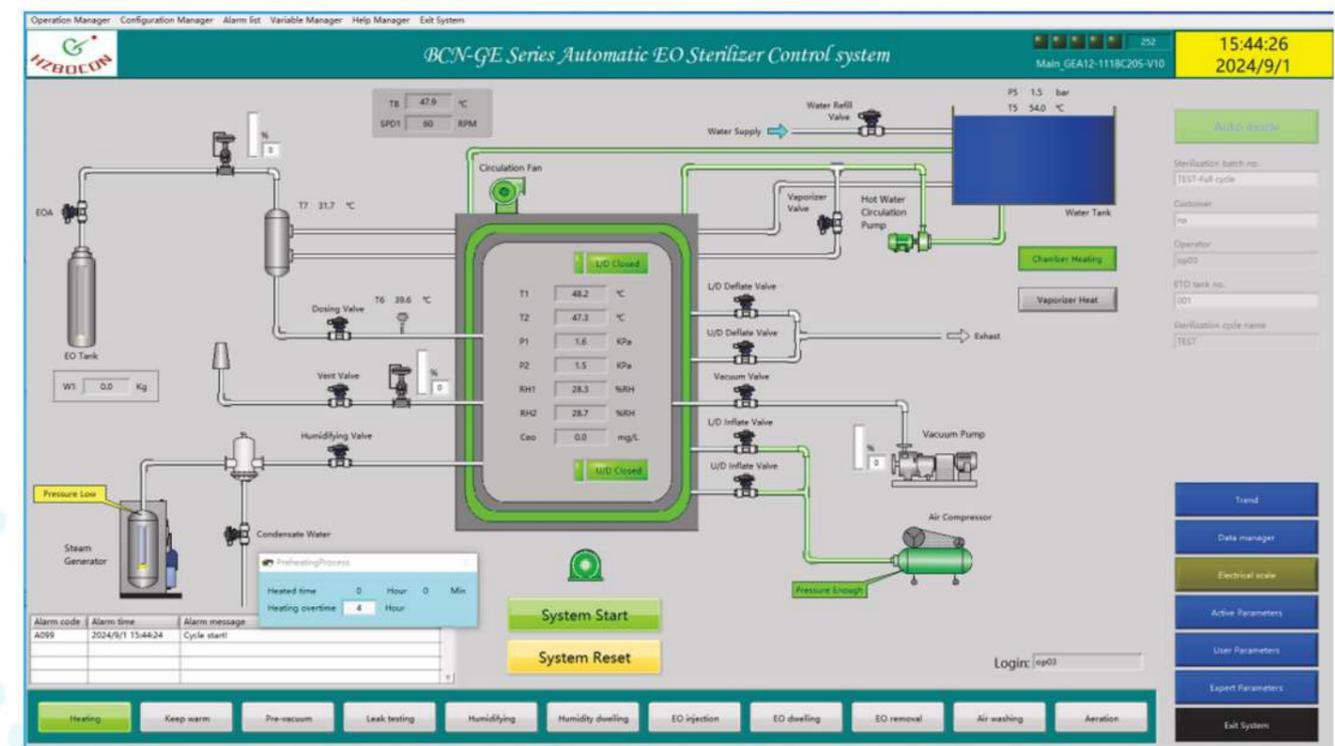
DOOR CATEGORIES

Providing professional 3D design

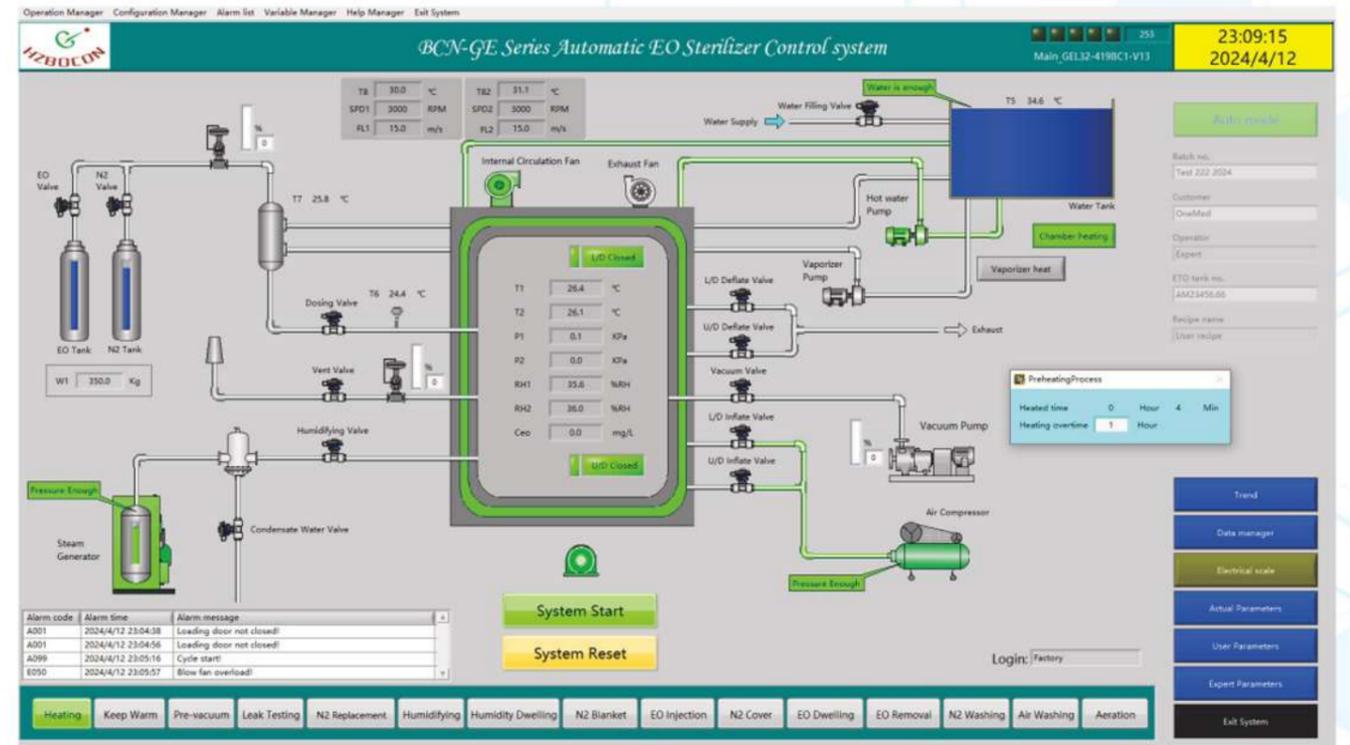
常规工艺 07

NORMAL STERILIZATION PROCESSES

MIXED GAS PROCESSES (C10)



FULL NITRIDE PROTECTION PROCESSES (N20)



控制系统
CONTROL SYSTEMS
08



Separate Control System



Integrated Control System



Control System For Sterilizer

Other Control System



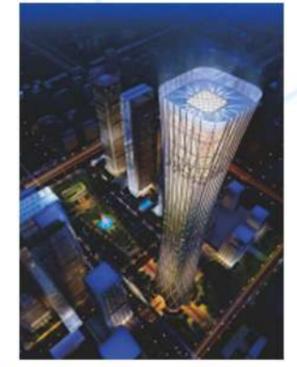
zinc plating auto-line



Die-Climbing Control System



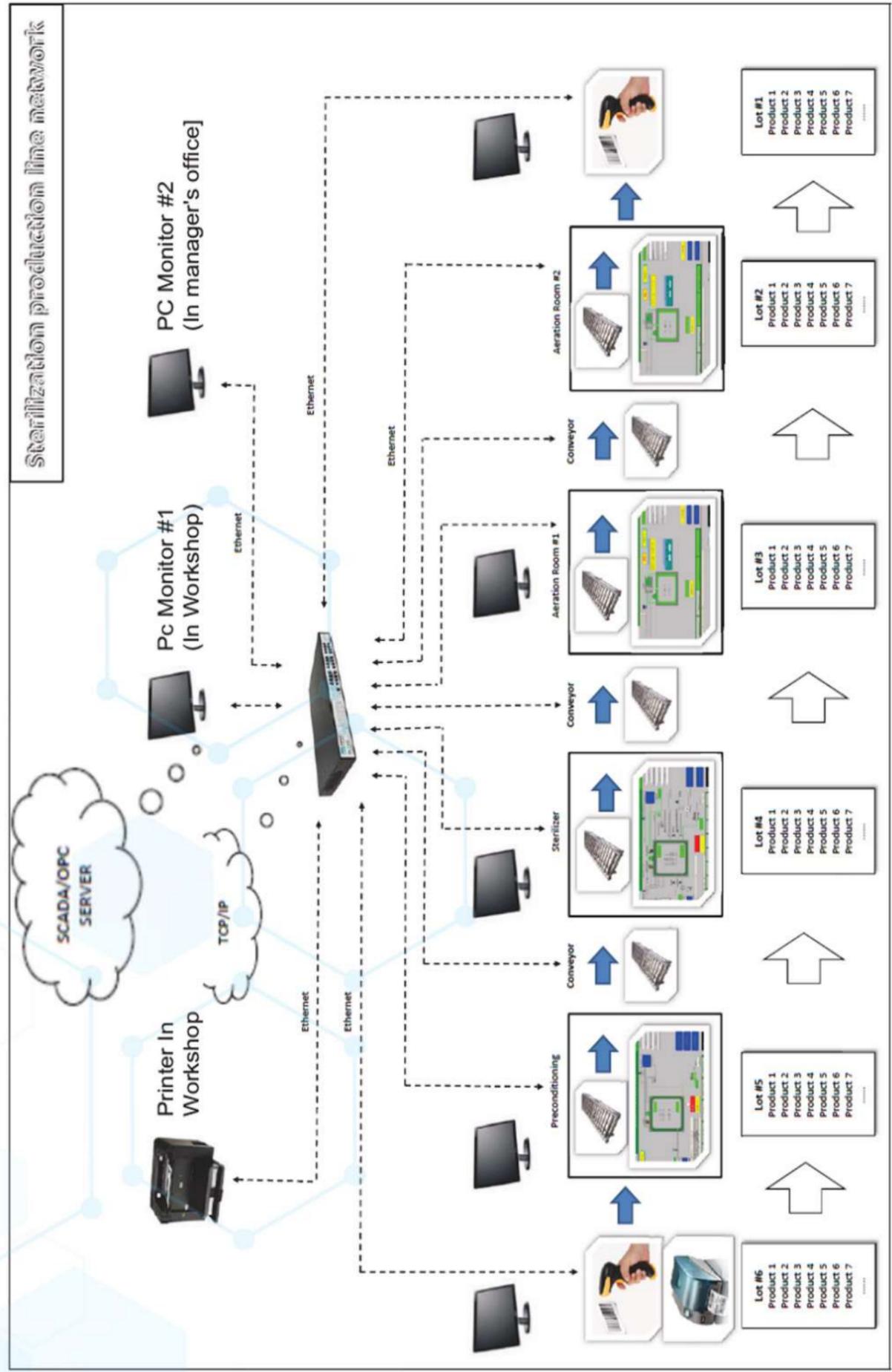
The control system for the Die Climbing Machine , which used to build the Suzhouinternational financial Center, which is thetallest building in Suzhou, is designed by our company.



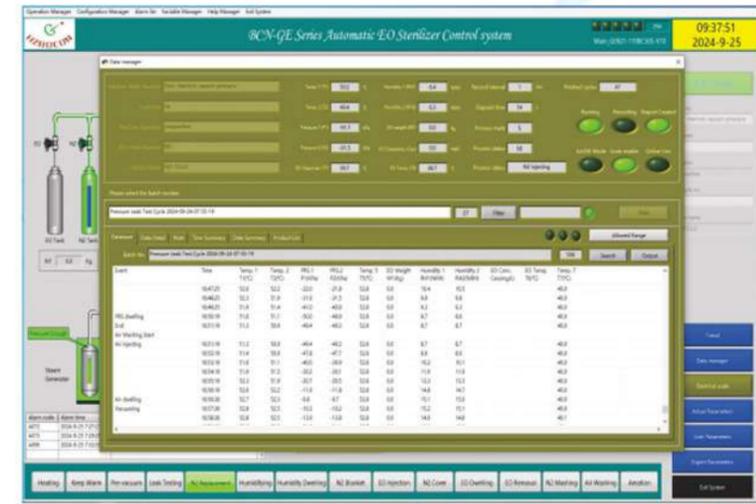
The control system for the Die Climbing Machine , which used to build the China Zun , the tallest skyscraper, is designed by our company .



The control system for the Die ClimbingMachine , which used to build the Suzhouinternational financial Center, is designed by our company .



Data Summary



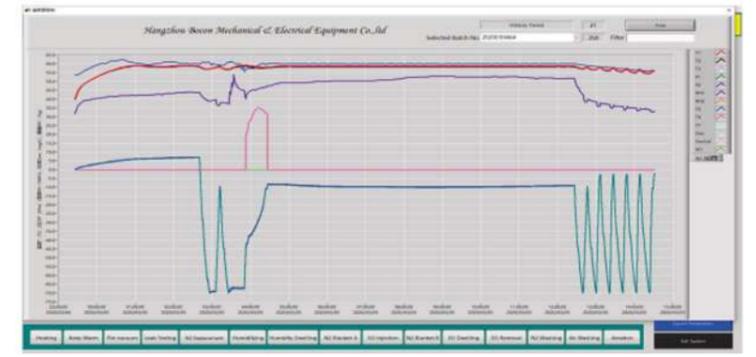
Detailed data

杭州博控机电设备有限公司
Hangzhou Bocon Mechanical electrical Co., Ltd.

Sterilization Lot#: Pressure Leak Test Cycle 2024-09 Cycle#: FAT-10.2.2 Sterilizer# B2023-ST42

Event	Time	Temp 1 (°C)	Temp 2 (°C)	Pressure 1 (KPa)	Pressure 2 (KPa)	Water Temp (°C)	EO Weight (kg)	EO Conc. (MPP)	Humidity RH1 (%)	EO Conc. (mg/L)	EO Temp (°C)	Vaporizer Temp (°C)	Alarm
Record Start Date Time	2024-09-24 07:55:20												
Preheating Start	07:55:20	43.7	43.1	0.9	1.0	30.6	0.0	25.8	26.0				36.6
Heating	07:56:20	43.8	43.2	0.2	0.3	30.9	0.0	25.8	25.9				36.6
	07:57:20	43.8	43.3	0.2	0.3	30.9	0.0	25.7	25.8				36.6
	07:58:20	44.0	43.4	0.3	0.4	30.9	0.0	25.6	25.8				36.6
	07:59:20	44.1	43.5	0.4	0.5	31.1	0.0	25.5	25.7				36.6
	08:00:20	44.2	43.6	0.5	0.6	31.2	0.0	25.3	25.6				36.6
	08:01:20	44.3	43.8	0.6	0.7	31.1	0.0	25.3	25.5				36.6
	08:02:20	44.4	44.0	0.7	0.8	31.4	0.0	25.2	25.3				36.6
	08:03:20	44.6	44.2	0.8	0.9	31.5	0.0	25.1	25.2				36.6
	08:04:20	44.8	44.3	0.9	0.9	31.4	0.0	25.1	25.1				36.6
	08:05:20	45.0	44.5	0.9	1.0	31.7	0.0	24.9	24.9				36.6
	08:06:20	45.1	44.7	1.0	1.1	31.7	0.0	24.7	24.8				36.6
	08:07:20	45.2	44.9	1.1	1.2	31.6	0.0	24.6	24.7				36.6
	08:08:20	45.5	45.0	1.1	1.2	31.9	0.0	24.5	24.5				36.6
	08:09:20	45.6	45.3	1.2	1.3	32.0	0.0	24.4	24.3				36.5
	08:10:20	45.8	45.4	1.3	1.4	31.9	0.0	24.2	24.2				36.5
	08:11:20	46.0	45.7	1.3	1.4	32.2	0.0	24.1	24.0				36.5
	08:12:20	46.2	45.8	1.4	1.5	32.2	0.0	23.9	23.8				36.5
	08:13:20	46.3	46.0	1.4	1.5	32.1	0.0	23.8	23.7				36.5
	08:14:20	46.5	46.2	1.5	1.6	32.4	0.0	23.6	23.6				36.5
	08:15:20	46.7	46.4	1.6	1.6	32.5	0.0	23.5	23.5				36.5
	08:16:20	46.9	46.5	1.6	1.7	32.4	0.0	23.4	23.3				36.5
	08:17:20	47.0	46.7	1.7	1.8	32.7	0.0	23.1	23.1				36.5
	08:18:20	47.2	46.9	1.7	1.8	32.6	0.0	23.1	23.0				36.5
	08:19:20	47.4	47.1	1.8	1.9	32.6	0.0	23.0	22.8				36.5
	08:20:20	47.5	47.3	1.8	1.9	33.0	0.0	22.9	22.8				36.5

Trend chart



Annotation Table

杭州博控机电设备有限公司
Hangzhou Bocon Mechanical electrical Co., Ltd.

Definition List for the Acronyms Used	
Sterilization lot#	Pressure Leak Test Cycle 2024-09-24-07-55-11
Customer Name	NA
Sterilizer Operator	op03
ETOTank#	1
Cycle Name#	FAT-10.2.2
Sterilizer#	B2023-ST42

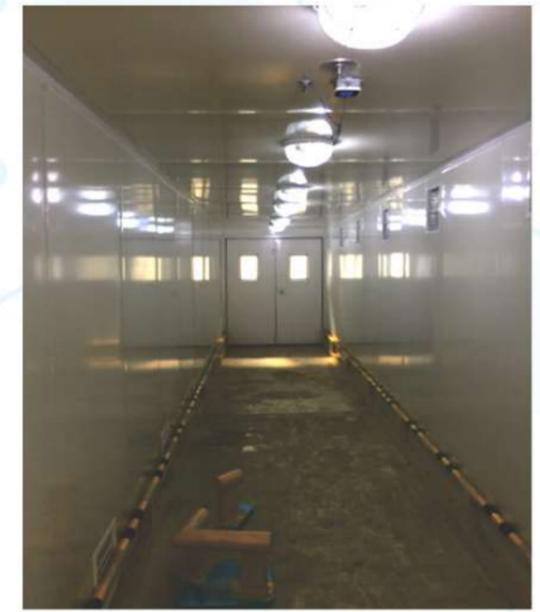
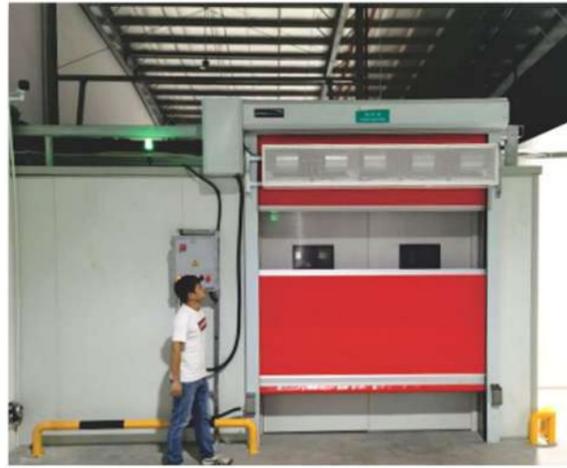
Below is a definition list for the acronyms used in the following Sterilization Process Raw Data Print-out

T1	Sterilization chamber temperature 1
T2	Sterilization chamber temperature 2
P1	Sterilization chamber pressure 1
P2	Sterilization chamber pressure 2
RH1	Sterilization chamber humidity 1
RH2	Sterilization chamber humidity 2
T5	Water tank temperature
T6	EO temperature
T7	Volatilizer temperature
Ceo	EO consistence of chamber
W1	EO tank weight
Alarm Msg	Alarm Message
PRS	Pressure
PRO	Process
TEMP	Temperature

EO Sterilization Process Parameters Conclusion

EO Sterilization Process Parameters Conclusion						
Sterilization Batch No.	Full Cycle 4 5-21-25 20250521160119					
Customer Name						
Sterilizer Operator						
EO Tank No.	E007240					
Recipe Name	Full Cycle					
Sterilizer Equipment No.	BoconEquipment					
Process Parameters	Set Value	Actual Value		Allowed Value		Pass/Fail
		min	max	min	max	
Precondition start temperature T1 (°C)	—	30.0	0.0	40	40	Pass
Precondition start temperature T2 (°C)	—	29.3	0.0	40	40	Pass
Pre-Conditioning Dynamic: Initial Vacuum Pressure Set Point P1 (kPa)	-91.5	-93.2	-93.1	44	56	Fail
Pre-Conditioning Dynamic: Initial Vacuum Pressure Set Point P2 (kPa)	-91.5	-92.9	-92.8	44	56	Fail
Pre-Conditioning Dynamic: Steam Inject Set Point P1(kPa)	-93.0	-91.9	-91.4	-95.0	-85.0	Pass
Pre-Conditioning Dynamic: Steam Inject Set Point P2(kPa)	-93.0	-91.8	-91.3	-95.0	-85.0	Pass
Pre-Conditioning Dynamic: Number of Pulses	5	5	-92.0	-86.0	Fail	
Pre-Conditioning Dynamic: End Process Temperature T1 (°C)	50.0	50.0	-92.0	-86.0	Fail	
Pre-Conditioning Dynamic: End Process Temperature T2 (°C)	50.0	49.7	0	15	Fail	
Pre-Cond. Dwell time (Mins)	240	240.0	180	300	Pass	
Pre-Cond. Dwell temperature T1 (°C)	50.0	50.0	51.7	44	56	Pass
Pre-Cond. Dwell temperature T2 (°C)	50.0	49.7	51.7	44	56	Pass
Humidity 1 after Pre-Cond. Dwell 30min(RH1)	40.0	39.9	43.9	NA	NA	NA
Humidity 2 after Pre-Cond. Dwell 30min(RH2)	40.0	41.9	48.3	NA	NA	NA
Initial vacuum value P1 (KPa)	-91.5	-91.7	-95	-85	Pass	
Initial vacuum value P2 (KPa)	-91.5	-91.6	-95	-85	Pass	
Initial vacuum time (Mins)	—	0.0	NA	NA	NA	
Leak testing time (Mins)	7	7.0	5	7	Pass	
P1 Pressure rise in leak testing (ΔKPa)	—	-0.1	NA	NA	NA	
P2 Pressure rise in leak testing (ΔKPa)	—	0.0	NA	NA	NA	

AUXILIARY PRODUCT 09



Precondition Room

Aeration Room

AUXILIARY PRODUCT 09



EO Recycling



EG Burner



EO Scrubber

AUXILIARY PRODUCT 09



EO Sensor

SEC



Specialized for cabinet inspection



Specialized for cabinet inspection

Magnetic Fan



Steam Generator



Sterilizer door controller

Patent number 201*****3506.6



Nitrogen making machine



Conveyor

客户交流 11

CUSTOMER COMMUNICATION



公司资质 10

COMPANY QUALIFICATION





44

COUNTRIES SOLD TO TILL TODAY

Algeria	Bangladesh	Botswana	Brazil
Burma	Cambodia	Canada	Colombia
Congo	Egypt	Ethiopia	India
Indonesia	Iran	Iraq	Italy
Japan	Kazakhstan	Korea	Malaysia
Mexico	Mongolia	Nepal	Nigeria
Oman	Pakistan	Paraguay	Peru
Qatar	Russia	Saudi Arabia	Somalia
South Africa	Sri Lanka	Syria	Thailand
The United Arab Emirates	Turkey	Uganda	USA
Uzbekistan	Vietnam	Yemen	Zimbabwe