ponpe
INSTRUMENTS

PROTRONICS

LAB
& Measuring Instruments

LED/LCD Microprocessor Controller (with timing function)

The cooling incubator is ideal for every application in microbiological field.
The range of temperature allows the growth of microorganisms in every environmental situation.

Features

- 304 stainless steel, mirror polishing processing, easy to clean and maintain.
- PID controller with over temperature alarm and timing function ensures precise and reliable control, also guarantee an excellent control by microprocessor and the limited number of setting keys ensures an extremely simple and intuitive operability.
- The inner lamp for observation of the samples is standard supplied.
- 3 fan speed meets all requirements of different experiments.
- Famous brand compressor with refrigerant R134a.

Option

- Independent over-temperature alarm system ensures experiments running safely.
- RS 485 connector can connect computer to save the data via software.
- A side through-hole diameter of 25 mm in order to install one or more temperature sensors inside the cha

PONPE 70LRHF   PONPE 150LRHF   PONPE 250LRHF

PONPE
📱 02-5316293   ✉ sale@ponpe.com   🌐 ponpe.com
INSTRUMENTS
f ปมเป   Q   LINE @ponpe   Q

ponpe
INSTRUMENTS

Specifications

Model	PONPE 70LRH PONPE 70LRHF	PONPE 150LRH PONPE 150LRHF	PONPE 250LRH PONPE 250LRHF	PONPE 500LRHF	PONPE 800LRHF	PONPE 1000LRHF	PONPE 1500LRHF
Temp. Range	0~60°C						
Display Resolution	0.1°C						
Temp. Stability	HIGH±0.5°C LOW±1.0°C						
Temp. Uniformity	±1.5°C			±2.5°C			
Humidity Range	–						
Humidity Stability	–						
Electrical Requirement	±2.5°C						
Ambient Temperature	+5°C ~30°C						
Power consumption	450W	500W	600W	2100W	4100W	4100W	5000W
Interior Dimension (W×D×H)mm	400×350×500	503×470×808	540×460×1000	670×720×1020	800×590×1650	1050×590×1650	1550×590×1650
External Dimension (W×D×H)mm	530×560×1080	600×630×1360	637×662×1590	850×1100×1930	1475×890×1780	1410×890×1950	2110×890×2050
Shelves	2(pcs)		3(pcs)				
Timing Range	1~5999min						
Remark	"F" model is with LCD display LRH–1000F, LRH–1500F is standard with two doors						

PONPE 500LRHF   PONPE 800LRHF   PONPE 1000LRHF   PONPE 1500LRHF

Touch Screen Microprocessor Controller (with timing function)

The cooling incubator is ideal for every application in microbiological field. The wide range of temperature allows the growth of microorganisms in every environmental situation.

The stainless-steel chamber with rounded corners and removable shelves which make the sanification operations easy.

The PID regulator guarantee an excellent control by microprocessor and the limited number of setting keys ensures the convenience to operate.

Features

- Colourful touch screen controller.
- The lowest temperature could arrive -10°C ,the applications temperature is wider.
- Using environmentally friendly refrigeration system,fast cooling speed,saving energy and protecting environment.
- Using R134a refrigerant.
- Using advanced control technology,heating systems and refrig eration systems shift automatically.
- 304 stainless steel,mirror polishing processing,easy to clean and maintain.
- Reserving 25mm test hole,could real-time test the temperature in working chamber.
- Pt100 temperature sensor provides high temperature sensitivity and the accuracy.
- With limited temperature alarm system.
- Programming setting function with 7 periods and 9 steps for each period, which means there are 63 programmable steps in total.

Options

- RS485 connector and software

- BOD Socket

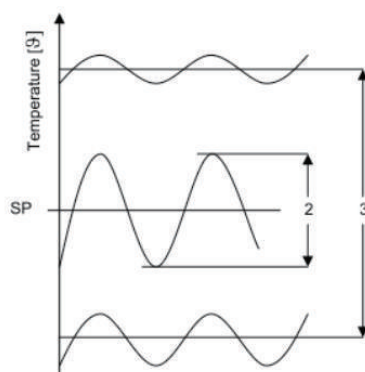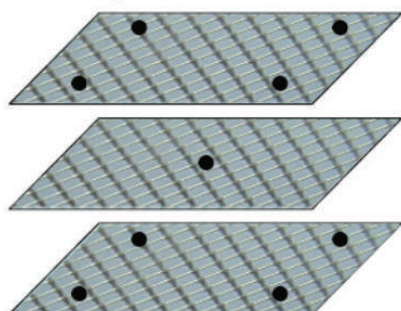- Independent temperature-limiting Alarm system

- UV Sterilizer

Cooling Incubator

4

Specifications

Model	PONPE 60BC	PONPE 120BC	PONPE 250BC
Usable Volume	68L	120L	250L
Temperature Range	−10~80°C	−10~80°C	−10~80°C
Temp. uniformity(@25°C)	±1.0°C	±1.0°C	±1.0°C
Temperature Resolution	0.1°C	0.1°C	0.1°C
Timer Range	1~5999min	1~5999min	1~5999min
Number of Shelves	2	3	3
Max Number of Shelves	10	14	16
N/W	85Kg	100Kg	120Kg
Interior Dimension(W×H×D,mm)	400×450×380	500×600×400	550×750×600
Exterior Dimension(W×H×D,mm)	545×1000×670	645×1150×690	695×1300×890
Electrical Requirement	220V 50Hz	220V 50Hz	220V 50Hz
Power Consumption	1300W	1500W	1700W

Standard :DIN−12880

Independent adjustable temperature safety equipment, 2 class (DIN12880) ,with second set of temperature alarm.
The temperature data was measured according with part 2 of DIN12880 suggested , means the space between the body and wall equal to ten percent of the height , width, depth of the chamber.

9-point measurement

test standard DIN-12880

Touch Screen Microprocessor Controller (with timing function)

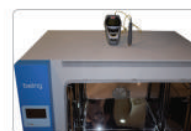The PID controller, with colourful touch screen, clearly shows in every moment the temperature set and that oneinside as well as other parameters. BI–F series forced air heating incubator, forced air circulation guarantees a perfect air replacement and homogeneity of temperature in every parts of the chamber.

Features

• Colourful touch screen controller.
• 304 stainless steel,mirror polishing processing,easy to clean and maintain.
• The fan is forced–air convection, with good temperature uniformity and two levels power to shift automatic.
• The shelf design of anti–tilting to avoid the accidents when pulling out the shelves.
• With high–precision thermal temperature sensor,high measuring accuracy and control stable.
• With reserved test hole,the temperature in working chamber can be detected accurately.
• With limited temperature alarm system.
• Programming setting function with 7 periods and 9 steps for each period, which means there are 63 programmable steps in total.
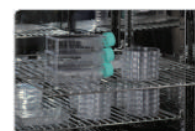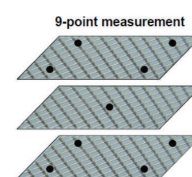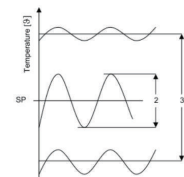
USB data collect

test hole   fan   shelf

Standard :DIN–12880

Independent temperature safety equipment , 2 class(DIN12880) , with second set of temperature (alarm.The temperature data was measured according with part 2 of DIN12880 suggested, means the space between the body and wall equal to 10% of the height , width , depth of the chamber.

9-point measurement

test standard DIN-12880

Specifications

Model	PONPE 30BIF	PONPE 50BIF	PONPE 120BIF	PONPE 200BIF
Chamber Volume	35L	50L	118L	210L
Temperature Range	RT +5~80°C			
Temperature Stability	±2.0°C			
Display Resolution	0.1°C			
Temperature uniformity(@37°C)	±0.8°C			
Standard Quantity of Shelves/Max	2/5	2/6	2/10	2/16
Shelves loading	20Kg	20Kg	20Kg	20Kg
N/W(Kg)	48	56	82	119
Timer Range	1~5999mins	1~5999mins	1~5999mins	1~5999mins
Internal Dimension(WAD,mm)	320x320x300	400x415x305	520x530x430	650x650x500
External Dimension(WAD,mm)	610x545x550	690x640x560	810x755x685	940x875x755
Electrical Requirement	AC220V,50Hz			
Power Consumption	300W	350W	600W	700W

PONPE
📱 02-5316293 ✉ sale@ponpe.com 🌐 ponpe.com
INSTRUMENTS
f ปมเป LINE @ponpe

LED Microprocessor Controller (with timing function)

Provided as a necessary equipment for scientific research to colleges as well as biological, agricultural and scientific research departments for storage of mould and biology cultivation.

Features

- 304 stainless steel, mirror polishing processing, easy t clean and maintain.
- PID controller with over temperature alarm and timing function ensures precise and reliable control
- Auto fan speeds ensures a proper fan speed when temperature is stable.
- Inner glass door provide a better observation.
- Glass door switch control automatically cut the heatin elements and fan when door is open.

Option

- Independent over-temperature alarm system ensures experiments running safely.
- RS 485 connector can connect computer to save the data via software.
- UV lamp sterilization system ensures a better and easier sterilizing.

Specifications

Model	DHP-9012	DHP-9032	DHP-9052	DHP-9082	DHP-9162	DHP-9272	DHP-9402 DHP-9602 DHP-9902
Electrical Requirement	220V 50Hz						
Temperature Range	RT+5~65°C						
Display Resolution	0.1^{o}C /±0.5^{o}C						
Temperature Uniformity	±1.5^{o}C						±2.0^{o}C
Ambient Temperature	+5~35°C						
Power consumption	200W	200W	300W	400W	600W	750W	1100W 1400W 2200W
Chanber Volume	16L	35L	50L	80L	80L	270L	420L 620L 1000L
Interior Dimension(W×H×D,mm)	250x260x250	340x320x320	415x360x355	500x400x400	500x500x650	600x600x750	640x585x1355 840x600x1355 1000x600x1600
Exterior Dimension(W×H×D,mm)	530x480x420	620x490x490	690x500x500	780x530x560	790x630x810	890X740X910	780x750x1880 980x800x1880 1140x800x2150
Shelves(pcs)	2						3/4/4
Timing Range	1~5999min						

ponpe INSTRUMENTS

CO₂ Incubator

With Imported Infrared CO2 Sensor

Features

- Touch screen controller, 72–hour machine operation record query function to help user tracking abnormal conditions and trace historical operation information.
- Faster CO2 concentration Restoration Speed.
- Infrared sensor can keep CO2 concentration stability and uniformity when door open frequently.
- Polished stainless–steel chamber, semicircular arcs at corners for easy cleaning, and the space between the shelves in the chamber is adjustable.
- Microorganism filter at inlet provides 99.99% filtration of bacteria and dust (ϕ<0.3μm) and supplies
- pure CO2 into the incubator.
- Door temperature controller prevents dewfall on glass door of incubator effectively.
- Independent audible and visible temperature–limiting alarm system ensures experiments safely.
- Alarm function for temperature difference, CO2 over concentration and concentration difference, door open time, UV working status.
- Auto–controller of fan speed to prevent damage to the samples.
- 90°C high temperature and humidity streilization function.(RHP series)

touch screen

Specifications

Model	PONPE 40BPN-RHP	PONPE 80BPN-RHP	PONPE 150BPN-RHP	PONPE 240BPN-RHP
Electrical Requirement	220V 50Hz			
Screen	7" Touch screen			
Power Consumption	350W	500W	700W	1000W
Heating Method	Air–jacketed, PID Control			
Temperature Range	RT+5~50°C			
Ambient Temperature	+5~30°C			
Temperature Stability	±0.1°C			
CO2 Range	0~ 20% V/V			
CO2 Control Resolution	±0.1%(IR sensor)			
CO2 Recovery	(Door open 30s,recovery to 5%) ≤ 3min			
Temperature Recovery	(Door open 30s,recovery to 37°C) ≤ 8min			
Humidity Method	Natural vaporization ≥ 90%			
Chamber Volume	40L	80L	150L	240L
Interior Dimension (WxDxH)mm	400x286x350	400x450x500	480x530x610	600x630x670
Exterior Dimension (WxDxH)mm	590x440x576	590x687x790	670x77x880	790x840x940
Shelves	2(pcs)		3(pcs)	
Sterilization method	18hrs (90°C moist heat disinfection)			

LCD Microprocessor Controller (with timing function)

Features

- Large LCD screen to display more data at same time.
- R134a refrigerant, imported compressor and fan motor.
- Big observation windows.
- 304 Stainless steel chamber and platform, easy to clean.
- The parameters can be automatically stored in case of power failure, and it will continue presetting program after turn on.
- Microprocessor PID controller for temperature and shaking speed with timing function.

Safety

- Safety door switch, auto pause operation when door is opened.
- Smooth start and stop system prevents liquid spillage.
- Auto–controller of fan speed to prevent damage to the samples.
- Maintenance–free brushless DC motor can continuous operation for long time.
- Self–diagnosis function, it will display error when failure. Safety door switch, auto pause operation when door is opened.
- Smooth start and stop system prevents liquid spillage.
- Auto–controller of fan speed to prevent damage to the samples.
- Maintenance–free brushless DC motor can continuous operation for long time.
- Self–diagnosis function, it will display error when failure.

Specifications

Model	PONPE 211HZQ	PONPE 311HZQ	PONPE 211HZQC	PONPE 311HZQC
Electrical Requirement	220V 50Hz			
ShakingSpeed Range	40~300r/min			
Amplitude	26mm			
Temperature Range	RT+5~65°C		4~65°C	
Display Resolution	0.1^{o}C			
Power Consumption	1050W		1300W	
Platform Size(mm)	750x460	920x500	750x460	920x500
External Dimension (WxHxD)mm	1080x620x915	1250x660x915	1080x620x915	1250x660x915
Timing Range	1~5999min			

Options

Spring wire rack	Universal attachment	Cell culture spring rack	Individual clamps	Rubber mat

PONPE
INSTRUMENTS
📱 02-5316293 ✉ sale@ponpe.com 🌐 ponpe.com
f ปอนเป @ponpe

ponpe
INSTRUMENTS

Shaking Incubator

LCD Microprocessor Controller (with timing function)

The shaking incubator combines in one instrument two typical laboratory operation:shaking and incubation of samples. Combining the convenience of a benchtop incubator and a shaker,it is ideal for cell culture,solubility studies,extraction procedures and many other laboratory applications.

Features

- Large LCD screen to display more data at same time.
- Stainless–steel chamber and platform, easy to clean.
- Big observation windows.
- Microprocessor controller for temperature and shaking speed with timing function.
- Self–check function easy to identify problems.
- Smooth start and stop system prevents liquid spillage.
- Auto–controller of fan speed to prevent damage to the samples.
- Safety door switch, auto pause operation when door is opened.
- High effective filter provides filtration of bacteria and dust.
- Temperature–limiting alarm system, auto switch off when over–temperature. (option)
- RS485 connector can connect computer record and inspect the parameters and the variations of temperature. (option)

Specifications

Model	PONPE 1BSI	PONPE 2BSI	PONPE 3BSI
Temperature Range	RT+5~65°C		
Temperature Resolution	0.1°C	0.1°C	0.1°C
Platform Size(WxD,mm)	250x250	350x350	400x400
Interior Height (H,mm)	220	270	320
Exterior Dimension (WxHxD,mm)	390x370x590	490x450x690	590x550x800
Maximum Capacity	1500ml	4000ml	6000ml
N/W	32 Kg	42 Kg	52 Kg
Convection	Forced Convection	Forced Convection	Forced Convection
Shaking Speed Range	40~250rpm	40~250rpm	40~300rpm
Speed Accurouce	±1rpm	±1rpm	±1rpm
Amplitude	20mm	20mm	20mm
Spring Wire Rack	Standard	Standard	Standard
Timer Range	1~5999mins	1~5999mins	1~5999mins
Electrical Requirement	AC220V/50Hz	AC220V/50Hz	AC220V/50Hz
Electrical Requirement	450W	650W	750W

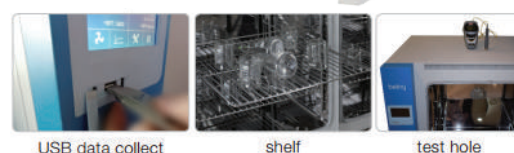| Clips for flasks	PONPE 1BSI/1BS	PONPE 2BSI/2BS	PONPE 3BSI/3BS
50(ml)	16	–	–
100(ml)	8	25	–
250(ml)	4	16	18
500(ml)	1	8	9
1000(ml)	–	4	5
2000(ml)	–	2	3

Touch Screen Microprocessor Controller (with timing function)

Mechanical Ovens allow for a smooth and efficient control of temperature from 10°C over ambient temperature to 200°C (300°C).The PID controller, with double color display, continuously displays the set temperature and actual temperature inside the chamber. Operating time is also displayed for the user. The fan generated circulation of air within the chamber helps to guaranty uniformity of temperature throughout the oven. As with all our ovens, we incorporate the best safety features assuring piece of mind to our customers when using BEING products!

Features

- Colorful touch screen controller.
- Interior Chamber made from 304 stainless steel with a mirror polished finish making for easy cleaning.
- Adjustable 3-Speed fan allows customer to control the flow of air optimal for temperature uniformity.
- Anti-tilt shelving helps avoid accidents when shelves are moved.
- Top centered portal allows real time testing of internal chamber temperature using external temperature measuring equipment.
- Adjustable shelves provide accommodation for different sized containers.
- Our damper PRPVIDES proper control of gas convection in chamber.
- Pt100 temperature sensor provides high temperature sensitivity and accuracy.
- The BEING Controller provides programmability for 7 periods and 9 steps for each period making for a total of 63 programmable steps.
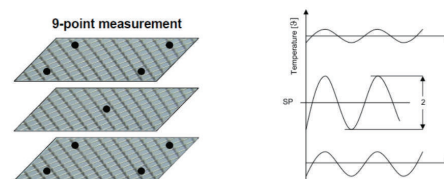
USB data collect   shelf   test hole

Standard :DIN-12880

Independent adjustable temperature safety equipment, 2 class (DIN12880) ,with second set of temperature alarm.
The temperature data was measured according with part 2 of DIN12880 suggested , means the space between the body and wall equal to ten percent of the height , width, depth of the chamber.

9-point measurement

test standard DIN-12880

Specifications

Model	PONPE 30BOF	PONPE 50BOF	PONPE 120BOF	PONPE 200BOF	PONPE 400BOF
Chamber Volume	35L	59L	115L	234L	400L
Temperature Range	RT+10°C~200°C (300°C)				
Display Resolution	0.1°C	0.1°C	0.1°C	0.1°C	0.1°C
Temperature Uniformity(@150°C)	±2.0°C	±2.0°C	±2.0°C	±2.0°C	±2.0°C
Standard Quantity of Shelves/Max	2/5	2/9	3/12	3/16	3/16
Shelves loading	20Kg	20Kg	20Kg	20Kg	20Kg
Net Weight(Kg)	43	51	83	112	–
Timer Range	1~5999mins	1~5999mins	1~5999mins	1~5999mins	1~5999mins
Interior Dimension(W×H×D,mm)	320×320×300	400×415×305	520×530×430	650×650×500	1000×800×510
Exterior Dimension(W×H×D,mm)	610×540×550	690×640×560	810×755×685	940×875×750	1285×1060×750
Electrical Requirement	AC220V,50Hz	AC220V,50Hz	AC220V,50Hz	AC220V,50Hz	AC220V,50Hz
Power Consumption	900W	1100W	2050W	2500W	3100W

Forced Air Oven

LED Microprocessor Controller (with timing function)

Provided for desiccation, torrefaction, wax–melting and sterilization in mining industry, laboratories and scientific research institutes.

Features

- 304 stainless steel, mirror polishing processing, easy to clean and maintain.
- PID controller with over temperature alarm and timing function ensures precise and reliable control.
- Air circulation system with specific air flow channel ensures a good temperature uniformity performance.
- Silicon door gasket with long lifetime, and easy to change.
- A damper adjustment in the front ensures the gas convection enough in working chamber.

Specifications

Model	PONPE 9013DHGA	PONPE 9030DHGA	PONPE 9050DHGA (9053DHGA)	PONPE 9070DHGA	PONPE 9140DHGA	PONPE 9240DHGA	PONPE 9420DHGA	PONPE 9460DHGA	PONPE 9920DHGA
Electrical Requirement	220V 50Hz					380V 50Hz			
Temperature Range	RT+10˚C ~250˚C								
Display Resolution	0.1˚C								
Temperature Stability	±1˚C								
Temperature uniformity	±3%(at 100˚C)								
Ambient Temperature	+5~40˚C)								
Power Consumption	500W	850W	1100W	1550W	2050W	2450W	3100W	4000W	5200W
Chamber Volume	16L	30L	50L	80L	136L	220L	420L	620L	1000W
Interior Dimension(WxDxH)mm	250x260x250	340x320x320	420x395x350	450x400x450	550x450x550	600x500x750	640x585x1355	840x600x1355	1000x600x1600
Exterior Dimension(WxDxH)mm	530x370x420	620x440x490	720x530x520	740x530x630	840x580x730	880x630x930	780x730x1780	980x800x1880	1140x800x2150
Shelves	2(pcs)		2(pcs)		2(pcs)		3(pcs)	4(pcs)	
Timing Range	1~9999min								

Model	PONPE 9015DHGA (9035DHGA)	PONPE 9055DHGA	PONPE 9075DHGA	PONPE 9145DHGA	PONPE 9245DHGA	PONPE 9425DHGA	PONPE 96250DHGA
Electrical Requirement	220V 50Hz				380V 50Hz		
Temperature Range	RT+10˚C ~300˚C						
Display Resolution	0.1˚C						
Temperature Stability	±1˚C						
Temperature uniformity	±3%(at 100˚C)						
Ambient Temperature	+5~40˚C)						
Power Consumption	850W	1100W	1550W	2050W	2450W	3100W	4000W
Chamber Volume	16L/30L	50L	80L	136L	220L	420L	620L
Interior Dimension(WxDxH)mm	250x260x250 340x320x320	420x395x350	450x400x450	550x450x550	600x500x750	640x585x135	840x600x1355
Exterior Dimension(WxDxH)mm	530x370x420 620x440x490	720x530x520	740x530x630	840x580x730	880x630x930	780x730x1780	980x800x1880
Shelves	2(pcs)	2(pcs)	2(pcs)	2(pcs)	2(pcs)	3(pcs)	4(pcs)
Timing Range	1~9999min						

Touch Screen Microprocessor Controller (with timing function)

Mechanical Ovens allow for a smooth and efficient control of temperature from 10°C over ambient temperature to 200°C (300°C).

The PID controller, with double color display, continuously displays the set temperature and actual temperature inside the chamber. Operating time is also displayed for the user.

The fan generated circulation of air within the chamber helps to guaranty uniformity of temperature throughout the oven. As with all our ovens, we incorporate the best safety features assuring piece of mind to our customers when using PONPE products!
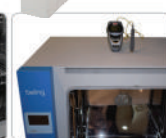
Features

- Colorful touch screen controller.
- Interior Chamber made from 304 stainless steel with a mirror polished finish making for easy cleaning.
- Adjustable 3-Speed fan allows customer to control the flow of air optimal for temperature uniformity.
- Anti-tilt shelving helps avoid accidents when shelves are moved.
- Top centered portal allows real time testing of internal chamber temperature using external temperature measuring equipment.
- Adjustable shelves provide accommodation for different sized containers.
- Our damper PRPVIDES proper control of gas convection in chamber.
- Pt100 temperature sensor provides high temperature sensitivity and accuracy.
- The PONPE Controller provides programmability for 7 periods and 9 steps for each period making for a total of 63 programmable steps.
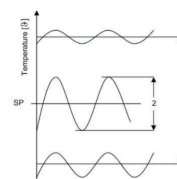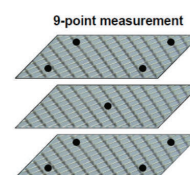
USB data collect   shelf   test hole

Standard :DIN-12880

Independent adjustable temperature safety equipment, 2 class (DIN12880) ,with second set of temperature alarm.

The temperature data was measured according with part 2 of DIN12880 suggested , means the space between the body and wall equal to ten percent of the height , width, depth of the chamber.

9-point measurement

test standard DIN-12880

Specifications

Model	PONPE 30BON	PONPE 50BON	PONPE 115BON	PONPE 200BON
Chamber Volume	34L	54L	124L	222L
Temperature Range	RT+10°C~200°C (300°C)			
Display Resolution	0.1°C	0.1°C	0.1°C	0.1°C
Temperature Uniformity(@150°C)	±2.5°C	±2.5°C	±2.5°C	±2.5°C
Standard Quantity of Shelves/Max	2/5	2/6	2/10	2/16
Shelves loading	20Kg	20Kg	20Kg	20Kg
Net Weight(Kg)	43 kg	45 kg	74 kg	103 kg
Timer Range	1~5999mins	1~5999mins	1~5999mins	1~5999mins
Interior Dimension(W×H×D,mm)	320×320×300	400×380×330	520×495×450	650×650×500
Exterior Dimension(W×H×D,mm)	610×580×520	690×640×468	810×755×590	940×910×658
Electrical Requirement	AC220V,50Hz	AC220V,50Hz	AC220V,50Hz	AC220V,50Hz
Power Consumption	850W	1050W	1950W	2250W

PONPE INSTRUMENTS
📱 02-5316293   ✉ sale@ponpe.com   🌐 ponpe.com
f ปนเป   @ponpe

Vacuum Oven

Touch Screen Microprocessor Controller (with timing function)
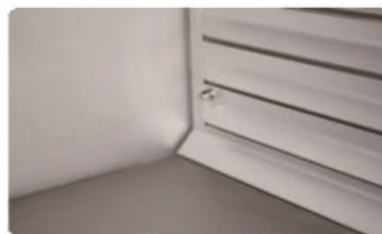
vacuum ovens offer a variety of sizes for a multitude of different applications with more usable space than competing ovens. The ovens feature a large viewing window, superior temperature control, and safety features for user and sample protection.

Features

- Colour LCD display
- Real–time display of measured vacuum to monitor the progress of the drying sample
- Inert Gas Inlet
- 304 stainless steel interior chamber
- Adjustable shelves for added flexibility to accommodate various size containers
- Electromagnetic valve controller safety feature for the exhaust valve and pump switch
- User–friendly, reliable, and power saving vacuum pump operation
- 7 programmable periods with up to 9 steps per period
- Timer: 1 to 5999 minutes
- Temperature Range: ambient 18°F to 392°F (10°C to 200°C)
- Display Resolution: 0.1
- Max degree of vacuum: 133 Pa
- Max. load per shelf: 20 kg
- 2 years warranty, parts and labour
- cETL approved

solenoid valve

stainless steel tank

LCD display

Specifications

Model	PONPE 20BOV	PONPE 50BOV	PONPE 90BOV
Chamber Volume(Cuft)	0.85	1.80	3.21
Temperature Range	Ambient +10°C ~200°C	Ambient +10°C ~200°C	Ambient +10°C ~200°C
Temperature Resolution	0.1°C	0.1°C	0.1°C
Max. degree of vacuum	133Pa	133Pa	133Pa
Standard Quantity of Shelves/Max	2/5	3/7	3/9
Work chamber material	stainless steel	stainless steel	stainless steel
Interior Dimension (WxHxD,mm)	300x275x300	415x345x370	450x450x450
Exterior Dimension (WxHxD,mm)	445x590x505	580x670x594	610x774x721
Max.load	20Kg	20Kg	20Kg
N/W(Kg)	60	95	145
Inert gas air inlet	✓	✓	✓
Electrical Requirement	AC120V/60Hz	AC120V/60Hz	AC120V/60Hz
Power Consumption	700W	1400W	2000W

Touch Screen Microprocessor Controller (with timing function)

Vacuum Ovens over a variety of sizes to fit the different needs of each of our customers. Due to our excellent design, the BEING vacuum oven offers more usable space then similarly sized ovens from the competition. A large viewing window allows the user to quickly view their samples from a distance. The PONPE controller offers superior temperature control and safety for our customers with a large colored LCD display for easy viewing.

Features

- Colorful touch screen controller.
- Real-time display of measured vacuum helps user monitor progress of the drying sample.
- Inert Gas Inlet.
- Interior Chamber made from 304 stainless steel with a mirror polished finish making for easy cleaning.
- Adjustable shelves for added flexibility to accommodate various size containers.
- Exhaust valve switching and pump switch come with an electromagnetic valve controller which is safe and reliable.
- User friendly and reliable operation while at the same time conserving vacuum pump power.
- The PONPE Controller provides programmability for 7 periods and 9 steps for each period making for a total of 63 programmable steps.

Standard :DIN-12880

Independent temperature safety equipment , 2 class (DIN12880).

stainless steel tank   touch screen   solenoid valve

Specifications

Model	PONPE 20BV	PONPE 50BV	PONPE 90BV
Chamber Volume	24L	51L	91L
Temperature Range	RT+10°C ~200°C	RT+10°C ~200°C	RT+10°C ~200°C
Temperature Resolution	0.1°C	0.1°C	0.1°C
Max. degree of vacuum	133Pa	133Pa	133Pa
Standard Quantity of Shelves/Max	2/5	2/7	3/9
Work chamber material	stainless steel	stainless steel	stainless steel
Interior Dimension (WxHxD,mm)	300x275x300	415x345x370	450x450x450
Exterior Dimension (WxHxD,mm)	445x590x505	580x670x594	610x774x721
Max.load	20Kg	20Kg	20Kg
N/W(Kg)	60	95	145
Inert gas air inlet	✓	✓	✓
Electrical Requirement	AC220V/50Hz	AC220V/50Hz	AC220V/50Hz
Power Consumption	700W	1400W	2000W
Timer Range	1~5999mins	1~5999mins	1~5999mins

PONPE
INSTRUMENTS
📱 02-5316293   ✉ sale@ponpe.com   🌐 ponpe.com
f ปันเป   LINE @ponpe

LCD Screen Microprocessor Controller (with timing function)

Features

- Polished stainless–steel chamber, semicircular arcs at corners for easy cleaning, and the space between the shelves in the chamber is adjustable.
- Auto–controller of fan speed to prevent damage to the samples
- Large LCD screen to display more data at same time
- Self–check function easy to identify problems.
- Over temperature and temperature difference alarms
- Independent audible and visible temperature–limiting alarm system ensures experiments run safely. (Option)
- Programmable controller: 15 periods 30 steps, 1 to 99 hs 99mins for each periods, fan speed 0 to 100% adjustable. (option)
- RS485 connector can connect computer and printer to record the parameters and the variations of temperature (option)

Specifications

Model	PONPE 9056BPG-A	PONPE 9106BPG-A	PONPE 9156BPG-A
Chamber Volume	50L	100L	175L
Temperature Range	RT–10~200°C	RT–10~200°C	RT–10~200°C
Display Resolution	0.1°C	0.1°C	0.1°C
Temperature Stability	±1°C	±1°C	±1°C
Temperature Uniformity	2.5%	2.5%	2.5%
Power Consumption	700W	1100W	1600W
Electrical Requirement	220V 50HZ	220V 50HZ	220V 50HZ
Internal Dimension(WxDxH, mm)	375x370x370	455x430x510	560x530x595
Shelves	2(PCS)	2(PCS)	3(PCS)

Options

- Intelligent programmable temperature controller(LCD)
- Printer
- Independent temperature–limiting Alarm system
- RS485 connector and software
- Test hole on the left (Φ50mm)

PLC Touch Screen Humidity Chamber With Refrigeration System

The humidity chamber creates a climate of temperature and humidity, perfectly designed for the high requirements of stability and climate tests, conditioning or ageing. In each individual appliance, there is a homogenous and stable temperature and humidity distribution over the entire chamber. Chamber complies with the strict requirements of DIN 12880:2007-05 and is equipped with a maximum of safety functions.

Features

- Colorful touch screen with microprocessor controller with timing function.
- Mirror polished stainless steel chamber with arc welding is easy to clean and disinfection.
- Accurate control of heating and refrigeration system ensure homogeneity of temperature and humidity.
- Refrigeration system colds down and condenses steam to ensure accurate humidity and temperature.
- R134A refrigerant is friendly to environment.
- Reserved 25 validation port is easy to validate the temperature real time.
- Independent temperature limits switch as secondary safety assurance.
- Programming setting function with 7 periods and 9 steps for each period, which means there are 63 programmable steps in total. (option)
- Microprinter and USB connection provides data recording.

Specifications

Model	PONPE 60BH	PONPE 120BH	PONPE 250BH
Effective volume	68L	120L	252L
Temperature Range		$-10{\sim}80^{\circ}C$	
Temperature homogeneity(@25°C)	$\pm1.0^{\circ}C$	$\pm1.0^{\circ}C$	$\pm1.0^{\circ}C$
Temperature accuracy	$0.1^{\circ}C$	$0.1^{\circ}C$	$0.1^{\circ}C$
Humidity control range	40~95%RH	40~95%RH	40~95%RH
Humidity deviation	±3%RH	±3%RH	±3%RH
Timer Range	1~5999min	1~5999min	1~5999min
Number of Shelves	2	3	3
Max Number of Shelves	10	14	16
N/W(Kg)	95Kg	115Kg	135Kg
Interior Dimension(W×H×D,mm)	400x450x380	500x600x400	550x750x600
Exterior Dimension (W×H×D,mm)	550x750x600	670x1270x200	720x1420x1000
Electrical Requirement	220V 50Hz	220V 50Hz	220V 50Hz
Power Consumption	2200W	2300W	2500W

ponpe INSTRUMENTS

Constant Climate Chamber

LCD/Touch Programmable Controller (with timing function)
Features

- LCD or Touch screen with microcomputer control, mirror polish stainless steel chamber with semicircular arcs at four corners.
- Over temperature and temperature deviation alarm.
- Capacitance humidity sensor and PT 100 temperature sensor.
- Automatically temperature and humidity balance system.
- Reserved n 25 validation port is easy to validate the temperature real time.
- Two sets compressors and fans work alternately that ensure no frost will be produce during test.

Programmable Touch Screen

- Large LCD screen to display more data at same time.
- English operation menu, display current data curves.
- 100 groups with 1000 periods 999 circulations, max timing for each period is 99 hours 59 minutes.
- Auto lock after setting data.
- Available to programe on computer via RS-484 or RS-232.
- Record temperature and time curves, data storage and logging function.

Specifications

Model	PONPE 80LHHSD PONPE 150LHHSD PONPE 250LHHSD PONPE 500LHHSD	PONPE 80LHHSDP PONPE 150LHHSDP PONPE 250LHHSDP PONPE 500LHHSDP	PONPE 800LHHSD PONPE 1000LHHSD PONPE 1500LHHSD	PONPE 800LHHSDP PONPE 1000LHHSDP PONPE 1500LHHSDP
Temperature control range	0~65℃ without illumination,10-65℃ with illumination			
Temperature Stability	±0.5℃			
Temperature Uniformity	±2℃			
Humidity Rang	35~95%RH			
Humidity Stability	±3%RH			
Timing Rang	Each period 1~5999min			
Controller	LCD screen	touch screen	LCD screen	touch screen
Ambient Temperature	+5~30℃			
Electrical Requirement	AC220V 50Hz		AC380V 50Hz	
Power Consumption	2000W/2100W/2300W/3750W		7150W/7150W/10600W	
Chamber Volume	80L/150L/250L/500L		800L/1000L/1500L	
Interior Dimension (WxDxH)mm	400x400x500 550x405x670 600x500x830 670x725x1020		800x590x1650 1050x590x1650 1550x590x1650	
External Dimension (WxDxH)mm	550x790x1080 690x805x1530 740x890x1680 850x1100x1930		1360x890x2000 1610x890x2000 2110x890x2000	
Shelves	2/3/3/4(pcs)		4(pcs)	

Illumination(options)	Cold white fluorescence and UV light
spectrum range	UV @320nm~400nm, peak wavelength @365nm
Intense/Deviation	Cold white fluorescence 0-6000lux/±500lux, UV0-5W/m2
Standard configuration	Cold white fluorescence (D65,6500K) comply with ISO10977;UVA@340nm~400nm Ultraviolet fluorescent lamp
Comply standard	GMP general standard,ICH-Q1B Cold white fluorescence≥1.2*106 Lux.hr, Ultraviolet fluorescent lamp≥200w.hr/M2

Touch Screen Microprocessor Controller (with timing function)

Product Features
Display
• 4.3 inch touch screen, menu type interface could set parameters fast, which is easy to understand and operation.
• BPT sensor, cabinet temperature and rain cycleetc, which can be visually settingand displaying.

light source
• With 4 pieces of 20W ultraviolet lamp, more stable and the life of the lamp is up to 5000 hours.

Controller
• B-UV-S series provide 3 spray headers which can meet the uniformity of rainfall for flat sample rack.
• Radiation intensity adjustment with optional RM-20 irradiance meter which by manual adjustment.
• Blackboard temperature self-control by test set value, to meet user for lighting, condensation, spray, temperature and other aging test chamber.

Sample shelf
• Build-in 4 pieces of 70x150 flat sample racks, the users can test for three-dimensional or flat samples.

Specifications

Model		PONPE B-UV-S(desktop)	PONPE B-UV-I	PONPE B-UV-II
Temperature Range	Light cycle	45°C –80°C		
	Condensation cycle	45°C –60°C		
Light source	Type	UVA	UVA or UVB fluorescent ultraviolet lamp	
	Power	20W/pc, total 4 pcs	40W/pc, total 8pcs	
	Wavelength range	Standard with UVA@340nm	Standard with UVA@340nm Optional@351nm or UVB@313nm	
	Irradiance	Handle	Irradiance automatic control	
Calibration function		No	Have	
Spraying function		3-hole spraying	No	12-hole sample spraying device
Sample shelf size		8 pcs standard sample test shelf	18 pcs standard sample test shelf(75x150mm)	
Center distance between sample and lamp		150mm~280mm	50mm±3mm	
Exterior dimension (WxDxH,mm)		770x565x690	1200x450x1500	
Cycle mode		Dark, light, spray, condensate set multi-cycle automatic control		
Light control		Handle	Irradiance automatic monitoring and control	
Electrical requirement		220V 50Hz		
Power consumption		2000W		

Touch Screen Microprocessor Controller (with timing function)

More real xenon lamp
• The xenon arc lamp reoccurs the full solar spectrum vividly which include ultraviolet, visible light and red light. With high quality lamp and the use life up to 1200~1500 hours.

Fast test results
• It can accelerate the aging experiment to achieve the effect of rapid aging.

Enhanced mirror illuminate
• Polished stainless–steel chamber makes the exposed area large enough and uniformity, enhanced the light irradiance and shorten the exposure time of sample.

Automatic Irradiance Control System
• It could real time monitor and control the light intensity to ensure the repeatability of the results, The control point of irradiance could choose 340nm, 420nm or 300~400nm.

Automatic Blackboard Temperature Monitor and Control
• B–SUN uses the blackboard temperature sensor monitor the exposure temperature of s accurately. (Cooling way: air cooling).
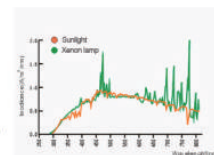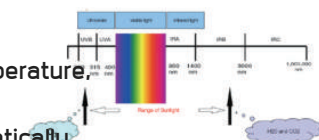
Easily calibrate light sensors
• Irradiance sensors need to be regularly calibrated by the user. The illuminometer must be compatible with the B–SUN.

Control system easy to operate and stable
• 9.7 inch touch screen, easy to understand and operate.Irradiation, blackboard temperature, rain cycle and so on could be easily set and display.
• Touch screen can display all parameters and diagnose the fault information automatically, With over–temperature protection and over–load protection.
• It provides referring and setting related industry standards. (could set 10 periods)

Blackboard thermometer

The spectrum of sun and Xenon lamp

Specifications

Model	PONPE B-SUN-I	PONPE B-SUN-II
Working chamber Dimension(WxDxH,mm)	320x320x320	
Exterior chamber Dimension(WxDxH,mm)	890x580x590	
Control system	Siemens PLC	
Program function	4 groups standard program built–in and 2 grous program can be set	
Sample area	930cm^2	
Sample surface temperature monitoring	blackboard temperature automatic control by sensor	
Irradiance control	340nm,420nm or 300nm–400nm Wavelength automatic control (standard with@340nm High–precision sensors)	
Spraying system	NO	Yes
Lamp cooling method	air cooling	
Sample shelf type	Flat plate type	
Lamp	Standard lamp tube, or Atlas lamp tube(optional)	
Electrical requirement	3500W	
Power consumption	220V, 50Hz	

LCD Microprocessor Controller (with timing function)

Water Baths provide the user with a constant temperature environment that only can be obtained when samples are totally immersed in water. PONPE Baths offer a variety of sizes, excellent specifications and safety features.
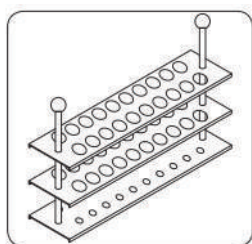
water level sensor

Holed bottom plate

Features

• Large colorful LCD display.
• Water level sensor shuts down further heating to the tank upon low water volumes.
• Audible and Visual Alarm indicators when water level reaches critical levels.
• 304 stainless steel molded tank.
• A variety of tube racks can be used for different test tubes.
• The standard stainless–steel bottom plate,helps prevents direct contact by accessories and tubes to heating element and sensors.
• Drain valve makes emptying of bath water fast and easy for cleaning and moving.
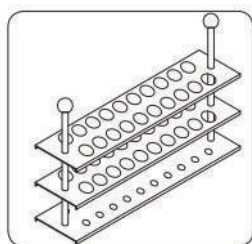• A variety of tube racks and accessories.

Specifications

Model	PONPE 12BWB	PONPE 22BWB
Temperature Range	Ambient+5~100°C	
Temperature Fluctuation	±0.3°C	
Tracking Alarm	≤0.2°C	
Timer	1~5999min	
Interior Dimension(WxDxH)mm	305x130x246	505x150x330
Exterior Dimension(WxDxH)mm	355x340x264	559x340x343
Net Weight	12 Kg	18 Kg
Electrical Requirement	AC220V / 50Hz	
Power Consumption	750W	1450W

Rack for Tubes

Φ13mm × 20   Φ18mm × 20   Φ31mm × 5   Φ56mm × 8   Blood bag holder

ponpe
INSTRUMENTS

Water Bath

Microprocessor controller (with timing function)

BWS-12/27

BWS-20

BWS-10

Features

- A stamping molding stainless steel tank, easy to clean.
- LCD screen, multiple data display with timing function, easy to operate.
- Stainless steel shelves cover heater and sensor to avoid damage during using.
- Once–forming stainless steel lid.
- Cut off heater automatically in case of lack of water, meanwhile visible and audible alarm ensures to remind users in time.
- Independent temperature–limiting alarm system.
- temperature error alarm.
- Test tube holder can be placed. (Option)

Specifications

Model	PONPE 5BWS	PONPE 10BWS	PONPE 20BWS	PONPE 0505BWS	PONPE 0510BWS	PONPE 12BWS PONPE 12BWSG	PONPE 27BWS PONPE 27BWSG
Electrical Requirement	AC220 50Hz						
Power Consumption	500W	1000W	2050W	500W+500W	500W+1000W	800W	1000W
Temperature Range	RT+5~99°C					RT+5~100°C RT+5~80°C	
Temperature Stability	±0.3°C					±0.2°C	
Temp Alarm	±2°C					0.1°C	
Interior Dimension(WxDxH)mm	130x280x150	220x280x150	290x490x150	130x280x150	130x280x150 290x490x150	300x240x200	500x300x200
Exterior Dimension(WxDxH)mm	396x250x260	396x330x260	600x390x260	450x395x260	526x395x260	480x300x480	680x360x390
Timing Range	RT+5~99°C						
Chamber Volume	2holes Φ2mm	4holes Φ92mm	6holes Φ92mm	2holes+2holes	2holes+4holes	11L	20L

PONPE
INSTRUMENTS
📱 02–5316293 ✉ sale@ponpe.com 🌐 ponpe.com
f ปมเป 🔍 LINE @ponpe 🔍

LCD Microprocessor Controller (with timing function)

Provided for precise and constant temperature and auxiliary heating in colleges industrial and mining enterprises and scientific research departments.

Features

- Microprocessor temperature controller.
- Audible and visible alarm for temperature and water level.
- R134a refrigerant, imported compressor.
- With interface to external water bath.
- RS485 connector is option which can connect computer to record the parameters and the variations of temperature.(option)

Specifications

Model	Temperature Range	Precision	Interior Dimension	Chamber volume	Electrical Requirements	Pump (flux)	Power Consumption
PONPE 5MPH	RT+5~100°C	±0.1	150×160×150	6.7L	220V 50Hz	8L/min	1050W
PONPE 13MPH			240×170×150	10.9L			1050W
PONPE 19MPH			330×300×150	22.5L			1050W
PONPE 13MPGA	RT+5~100°C		180×300×150	14.5L			1050W
PONPE 100MPGH	RT+5~100°C	±0.2	240×170×200	14.5L			1050W
PONPE 501MPA	RT+5~100°C						1050W
PONPE 10MPC	−10~100°C		150×160×150	4.5L			2300W
PONPE 20MPC	−20~100°C						2300W
PONPE 30MPC	−30~100°C						2800W
PONPE 40MPC	−40~100°C						3150W
PONPE 50MPC	−50~100°C						3150W
PONPE 10MPGC	−10~100°C		240×170×200	13L			2300W
PONPE 20MPGC	−20~100°C						2300W
PONPE 40MPGC	−40~100°C						3100W
PONPE 50MPGC	−50~100°C						3100W
PONPE 5MP(controller)	−100~200°C	0.1	130×150×330	≤50L			1050W

*When setting temperature is above 80°C , liquid medium should be mineral oil.
*When setting temperature is below 5°C , liquid medium should be antifreeze (Absolute alcohol or absolute glycol)
*Ambient temperature: +5~35°C

Specification test condition

- Ambient temperature: 20°C
- Electrical requirements: 220V/50Hz
- Liquid medium: pure water

PONPE 13MPH
PONPE 19MPH

PONPE 100MPGH

PONPE
INSTRUMENTS
📱 02-5316293   ✉ sale@ponpe.com   🌐 ponpe.com
f ปมเป   LINE @ponpe

LCD Microprocessor Controller (with timing function)

Widely applicable for laboratory researches on bacteria cultivation, fermentation, hybridization, chemical and biochemical reaction, enzymes and tissues research which have a high requirement on precision of shaking speed and temperature.

Features

• Large colorful LCD display.
• Water level sensor shuts down further heating to the tank upon low water vo
• Audible and Visual Alarm indicators when water level reaches critical levels.
• 304 stainless steel molded tank.
• A variety of tube racks can be used for different test tubes.
• The standard stainless–steel bottom plate,helps prevents direct contact by accessories and tubes to heating element and sensors.
• Drain valve makes emptying of bath water fast and easy for cleaning and moving.
• A variety of tube racks and accessories.

Specifications

Model	PONPE 1DKZ	PONPE 2DKZB	PONPE 3DKZ PONPE 3DKZB	PONPE 1DKZC
Temperature Range	RT+5~99°C			10~99°C
Display Resolution	0.1°C			
Temperature Uniformity	±1°C			
Shaking Speed Range	30~150rpm			
Amplitude	30mm (Standard) or 40mm (Option)			
Power Consumption	1250W		1650W	1500W
Interior Dimension(WxDxH)mm	438x310x250		618x310x250	440x300x250
Exterior Dimension(WxDxH)mm	643x350x353		823x350x355	710x410x710

LCD Microprocessor Controller (with timing function)

Orbital Shakers are the preferred method for blending samples inside tubes and flasks. Precision smooth orbital shaking motion is essential for many lab applications. Specific applications are fermentation, hybridization, chemical and biochemical reactions. PONPE's PID controller provides accurate speed with timed runs. Auto off and alarm occurs when the real shaking speed is 10% different from setting value, and motor will stop automatically. Speed controller ensures smooth start/stop which can prevent the liquid spill to damage the equipment.

Features

- Colorful LCD display.
- PID microprocessor controls shaking speed, and timing.
- Smooth start and stop system prevents liquid spillage.
- Stainless–steel and easy to clean platform.
- DC brushless motor provides long term reliability.
- Safety alarm and shutdown feature for speeds 10% over set speed.
- A large number of accessories (platforms, tube–racks, and flask clamps) to accommodate various needs.

Specifications

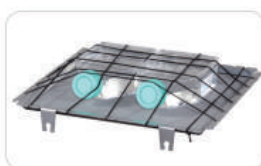| Model	PONPE 1BS	PONPE 2BS	PONPE 3BS
Speed	40~250rpm	40~250rpm	40~300rpm
Frequency	20rpm	20rpm	20rpm
Maximum Capacity	1500ml	4000ml	6000ml
Amplitude of Tray	20mm	20mm	20mm
Platform size(mm)	250x250	350x350	450x450
Exterior Dimension (WxHxD)mm	290x110x376	390x124x495	490x137x604
Timer	1~5999min	1~5999min	1~5999min
Net Weight	20 kg	30 kg	40 kg
Electrical Requirement	220V 50Hz		
Power Consumption	60W		

Options

| Spring wire rack | Universal attachment | Cell culture spring rack | Individual clamps | Rubber mat |

LCD Microprocessor Controller (with timing function)
Features

- Unique design of furnace door makes opening door safe and easy, ensure the heat of furnace will not leak out.
- Microcomputer PID controller, easy to operate, accurate, reliable and safe temperature control
- Corrosion-resistant light weight furnace ensure long-term life.
- The excellent door seal makes the heat loss minimum and increases the uniformity of the temperature in the furnace.
- PID Programmable controller with 7 periods and 9 steps for each period, which means there are 63 programmable steps in total, 0~5999mins for each periods and can set rising or remain temperature, and provide a program of temperature, time, heating power cycle.
- Programmable temperature controller can make experiments procedure more simple to realize automatic control.
  Door and body are all made of stainless steel which with anti-corrosion.

Safety

- The safety switch will automatic shutdown when door open ensures the safety of the operator, fan motor overheat and abnormal alarm system(1 Heater , 2 temperature sensor, 3 memory contents, 4 over temperature) sound and light alarms reminders operator and ensures experiments run safely
- Over-current, over-voltage, overheat and various safety measures to ensure safety.
- Ceramic fiberboard insulation material with good heat insulation effect, low temperature on shell surface.

High quality energy-saving design

- The safety performance design prevents the high energy consumption. Double-layer structure and cooling fan to make the furnace body is near room temperature during use.

Furnace material

- Firebrick furnace (N series) use of traditional refractory materials, wide range of applications, long life and economic.
- Ceramic fiber furnace (T series) with light weight, fast heating speed, saving energy and time etc. to satisfy the requirements under various conditions.

Specifications

Model	Max. Temp	Volume	Interior Size (mm)	Exterior Size (mm)	Electrical	Power	Heating Element	Temp Accuracy /Uniformity
PONPE 2-2.5-10BXNPCr	1000	2L	120x200x80	400x580x610	220V/50HZ	2.5KW	Electric furnace wire	
PONPE 2-4-10BXNPCr	1000	7L	200x300x120	520x650x660	220V/50HZ	4KW	Electric furnace wire	
PONPE 2-8-10BXNPCr	1000	16L	250x400x160	570x810x740	380V/50HZ	8KW	Electric furnace wire	
PONPE 2-12-10BXNPCr	1000	30L	300x500x200	700x930x845	380V/50HZ	12KW	Electric furnace wire	
PONPE 2-2.5-12BXNPCr	1000	2L	120x200x80	400x580x610	220V/50HZ	2.5KW	Nickel chrome wire	±1°C /5°C
PONPE 2-5-12BXNPCr	1000	7L	200x300x120	520x650x660	380V/50HZ	5KW	Nickel chrome wire	
PONPE 2-10-12BXNPCr	1000	16L	250x400x160	570x810x740	380V/50HZ	10KW	Nickel chrome wire	
PONPE 2-2.5-10BXTPCr	1000	2L	120x200x80	400x580x610	220V/50HZ	2.5KW	Electric furnace wire	
PONPE 2-4-10BXTPCr	1000	7L	200x300x120	400x580x610	220V/50HZ	4KW	Electric furnace wire	
PONPE 2-8-10BXTPCr	1000	16L	250x400x160	570x810x740	380V/50HZ	8KW	Electric furnace wire	
PONPE 2-10-12BXTPCr	1000	16L	250x400x160	570x810x740	380V/50HZ	10KW	Nickel chrome wire	

PRODUCT
CATALOG

PONPE INSTRUMENTS

- **Oven**
- **Incubator**
- **Chamber**
- **Water bath**

DOWLOAD
FULL CATALOG

บริษัท โปรโทรนิกส์ จำกัด

📞 **02-5316293**

FOLLOW US

f LINE 🌐

f ปนเป 🔍

LINE @ponpe 🔍

🌐 ponpe.com 🔍

38/40-41 หมู่ที่ 3 ถนนลำลูกกา ตำบลคูคต อำเภอลำลูกกา จังหวัดปทุมธานี 12130