

Heal Force Laboratory Equipment

Heal Force specialises in the design, development, manufacture and sales of laboratory equipments in the fields of Biosafety protection, Centrifugation, Cell culture, Water purification & Gene amplification.

Life Science

, Heal Force

Biosafety Cabinet



Heal Force brand stands for safety, ergonomics and performance. Taking advantage of a heritage from over 25 years experience, Heal Force offers safety features, options and accessories beyond the standard requirements, to fulfill different needs. Thousands of units installed in laboratories in more than 100 Countries.

Centrifuge

Neofuge, the name that defines quality centrifuges from Heal Force. Offering bench-top high speed models with or without refrigeration for today's discerning laboratory technicians. Neofuge series provide excellent centrifugal effect and maximum application versatility.

CO₂/Tri-Gas Incubator

Heal Force Smart Cell incubator provides you with natural simulation to ensure optimum growth conditions for you culture at all time. That's why it is widely used in fields of application including tissue engineering, in vitro fertilization, neuroscience, cancer research and other mammalian cell researches.

Water Purification

Wei I-proved Heal Force water purification system offers ideal and comprehensive solution for a choice of water qualities that range from primary for simple routine washing and rinsing, through to ultra-high grade for different critical science and analytical applications.

Thermal Cycler

Since PCR is central for molecular biology research, you need flexible solutions that can help you achieve PCR success for virtually any application. Heal Force has been developing new cycling platforms from economical option to advanced series to empower your search. These instruments are renowned for their reliability, accuracy, and user-friendly interfaces.

AlphaClean 1300

Vertical Laminar Flow Clean Benches



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Heal Force leads you to healthier life





The next level of cleanliness



Global market vision

Heal Force biosafety cabinets and laminar flow clean benches focus on quality and design that comes from a heritage of over 25 years* experience. At Heal Force we know how important it is to offer high level of protection to operator, sample and environment with advanced technology. With an extensive trace record of safety , reliability and performance, Heal Force cabinets and benches make an idea investment for a wide range of applications.



" We know clean . -air".

Welcome to Heal Force



We know how important to design a product in compliance with current worldwide safety standards. There are three widely recognized global standards for BSC performance; EN12469:2000(European standard), NSF/ANSI 49 (American standard) and YY0569 (Chinese standard).

NSF/ANSI 49
HFsafeLC series are independently tested and certified to NSF/ANSI 49, By NSF International, a leading testing agency in the USA.

EN12469
Our Class II type A2 biological safety cabinets are independently tested and certified to EN12469 standard



YY0569
Heal Force, as a dafter for Chinese BSC standard, has HFsafeLC series independently tested and certified to YY0569

The only Chinese manufacturer invited to attend global seminar for BSCs

2015

Launch of vertical laminar flow clean benches for clean-air product line extension

2016

2016

BSC for cytotoxic drugs is certified by DIN12980.

What makes AlphaClean superior?

AlphaClean clean benches are ideal for a wide range of applications where sample protection is required.

Outstanding comfort

With several thoughtful features, from the view screen to the work environment and ergonomic design

Energy Efficiency

From the motor controller to lighting, the new design can provide significant annual cost savings while maintaining superior performance

Q Prefilter

Chemically and thermally enhanced technology increase filtration capacity and efficiency, together with ergonomical filter

Friendly communication

Centered and angled down color-display for better at-a-glance viewing of safety and performance data.

Long life HEPA filter

Long life HEPA filter provides high separability for particles. Self-compensation for the clogging of filters and life span indicator optimize working condition and minimizes services

Real-time airflow monitoring

Velocity of airflow and temperature are inspected and indicated on control panel. Alert the user if airflow is insufficient

Universal electrical outlets

Two standard electrical duplex receptacles, with ground fault interruption and splash covers.

Illumination lamp

Illumination provides sufficient brightness to the working chamber.

UV lamp

Emission of 235.7 nanometers for efficient decontamination. Automatic UV timer program saves your time during daily work

Safety grade glass

The front glass window provides protection from explosion and UV with more comfortable viewing

Work tops

Standard constructed of seamless, non-porous type 304 stainless steel



Innovation makes cleanliness all possible

Behind every great discovery there is the technology that made it all possible.

Laminar airflow over the working area takes containment to new levels, ensuring your safety

e

Smart and self-induced motor monitors and controls fan speed in real-time to maintain constant airflow during filter loading and temporary obstruction

Flow-SaFe technology consumes less energy, reduces heat output and operates quietly



Filter life indicator is designed to measure filter life span according to actual condition of membrane

Visual and acoustic alarm for indication of unsafe airflow conditions and window position

Interlocking safety mechanism is set between UV lamp and fluorescent light/front sash status.



The colored LCD display offers a high level of viewing and operation experience

The intuitive interface delivers a constant read-out of working area temperature, air

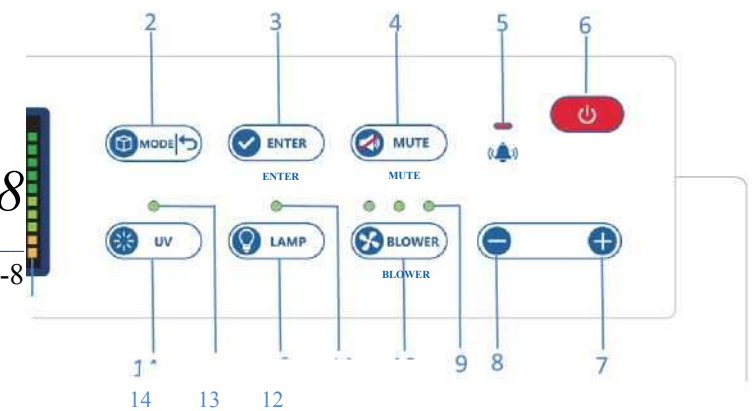
velocity/volume, filter life span, total running time

Easy-to-clean touchpad controls allow manual activation of blower, lamp, UV, electrical receptacles

and menu selection



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F. System status

H. HEPA filter lifespan

3. Enter key

4. Mute key

5. Alarm indicator

12. Fluorescent key

13. UV indicator

UV Decontamination

and convenience

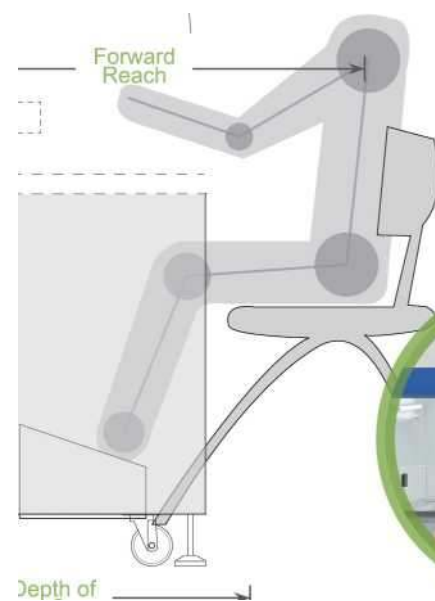


5 ° backward-slanted safety grade glass provides protection from explosion and UV with more comfortable viewing than vertical sashes.

Counterbalanced sliding sash can be raised to a maximum height for easy introduction of large items



The position of the light tubes ensure excellent illumination over the whole working zone and reduces operator fatigue.



The radiused edge prevents the potentially dangerous practice of placing materials



Silent working conditions save your brain, you can concentrate on work and even hear yourself thinking.

Programmable automatic UV light timer simplifies operation while extending UV lamp life and saving energy.

Powerful UV irradiation illuminates entire work area, design to ensure thorough disinfection of the complete chamber

UV lamp with interlocking safety switch allowing operation only when blower and fluorescent light are off and sash is fully closed



Easy to Clean

The clean bench work zone has no welded joints to collect contaminants or rust.

Details of cabinet developed further to ensure easier cleaning with normal cleaning solvents

Airflow laminator protects the filter surface during wipe cleaning.



All services, adjustments and filter change is carried out from the front of the cabinet.

Biosafety Cabinets	IEST-RP-CC002.2, Worldwide
Air Quality	ISO 14644.1, Class 5, worldwide
Filtration	EN-1822, Europe/ IEST-RP-CC001.3, Worldwide/ IEST-RP-007, Worldwide/ IEST-RP-CC034.1, Worldwide
Electrical Safety	EN61010-1, Europe/ IEC61010-1, Europe

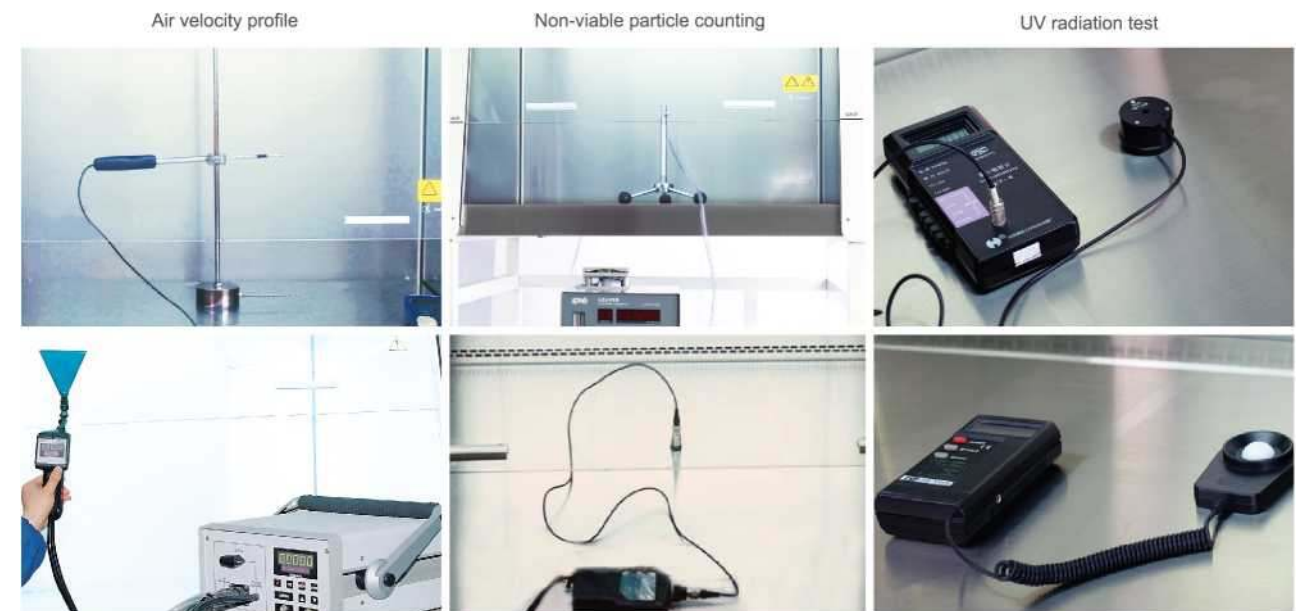
Standards Compliance

Manufacturer Qualification ISO 13485:2003, ISO 9001:2008

Service Access



Comprehensive performance testing



Every AlphaClean unit manufactured by Heal Force is individually tested, documented by serial number and validated with the following test methods.

Air Velocity Profile	Verifies the hood is providing the proper air balance to protect the product from contamination
Integrity Testing of HEPA filters	Assures the existing HEPA filters are free of leaks and are properly sealed to prevent leakage or possible contamination to the work area

<i>Air Velocity Profile</i>	Verifies the hood is providing the proper air balance to protect the product from contamination
<i>Non-Viable Particle Counting</i>	Testing provided to verify clean bench is meeting designed air cleanliness classification level per ISO 14644 specifications
<i>Viable / Microbial Air Testing</i>	Assures Bioburden levels for bacteria and/or fungi are within acceptable parameters per the cabinet design or client specifications
<i>Viable / Microbial Surface Testing</i>	Assures Bioburden levels for bacteria and/or fungi are within acceptable parameters per cabinet design or client specifications
<i>Airflow Visualization Profile</i>	Verifies the hood is providing non-turbulent airflow to work area
<i>Lighting Measurement</i>	Verifies the lighting level is meeting the clean bench design level or worker comfort level
<i>Sound Level Measurement</i>	Verifies the sound level is not exceeding the clean bench design or worker comfort level

customer support packages, factory acceptance testing.

Choose Heal Force as an equipment supplier and validation consultant can greatly reduce the time and cost involved with getting new equipment compliant and ready for use.

Services Heal Force Offers:

On-site consultation

Unit specific authorized protocol documents

Customizable testing procedures to meet customer specific requirements

Unbiased testing of competitive equipment

Pre-delivery Services:

Validation support

Consultation

Factory acceptance testing

On-site Services:

Installation qualification Operational qualification

Calibration

Temperature, Relative Humidity Measurements

Verifies the clean bench is operating within its design specifications

AlphaClean Vertical Laminar Flow Clean Bench Engineering Drawing - Front, Side

General Specifications, AlphaClean Vertical Laminar Flow Clean Bench

- | | | |
|--------------------------|-----------------------------------|--|
| 1. Pre-filter | 6. Water-proof electrical outlet | 11 Fluorescent light |
| 2. Blower | 7. Main power switch | 12. UV light |
| 3. Supply HEPA filter | 8. Adjustable Lever | 13. Toughened glass sliding door |
| 4. Downflow sensor | 9. Universal Wheel | 14. Sash lock |
| 5. Counterbalanced block | 10. Microprocessor control system | 15. Stainless steel single-piece work tray |

Nominal Size	1.3 meters
External Dimensions with Base Stand (WxDxH)	1500x760x1630mm
Internal Work Area, Dimensions (WW^H)	1380x650x510mm
Internal Workspace (Area)	0.90M ² (9.69 sq.ft)
HEPA filter size (WW^H)	1320x580x50mm
Prefilter size (WW^H)	400*380*3mm (2PCs)
Airflow	
Vertical Velocity *	>0.3m/s(Adjustable)
Vertical Volume	m ³ /h (cfm)
Supply Filter	
Type	HEPA
Material	Glass fibre fleece
Separability in MPPS	99.995%
Separability at 0.3um particle size	99.999%
Cleanliness in Work Area	ISO Class 5, Class 100 (Fed 209E)
No. of Sedimentated Bacteria Colony	<0.5CFU*0.5h
Sound Emission (Typical)*	<65dB
Fluorescent Light Intensity	450Lux
Excellent light distribution	Yes
Fluorescent Light Power and Number	11W,2PCs
UV Lamp Power and Number	8W,2PCs
RMS	<5um
Cabinet Construction	

AlphaClean Vertical Laminar Flow Clean Bench Engineering Drawing — Top

5
6
7

/Pressure block

Main Body	1.2mm(0.05") steel with white oven-baked epoxy-polyester power-coated
Side Walls	1.2mm(0.05") steel with white oven-baked epoxy-polyester power-coated
Work Zone	1.5mm (0.06") stainless steel, grade 304
Window Material	Hardened/laminated safety glass
Working Temperature	10 ~30 C
Working Humidity	30 ~75%RH
Electrical (220-240V, 50/60Hz, 1 phase)	
Cabinet Full Load Amp(FLA)	2.5A
Optional Outlets FLA	3A

Cabinet Maximum Power	550VA
Cabinet Nominal Power	300VA
Power Supply**	
220V±10%/50Hz	Yes
220V±10%/60Hz	Yes
110V±10%/60Hz	Yes
Protection	
Protection class	I
Protection type	IP20
Overvoltage category	II
Contamination degree	2
Net Weight	185kg(408lbs)
Shipping Weight	250KG
Shipping Dimensions Maximum(W^D^H)	1600*840*1800mm
Shipping Volume, Maximum	

