





COVID-19

Esco Aster Streamline Swab BoothTM (SSBTM)

Providing Safety and Efficiency during Swab Collection of COVID-19 PUIs





Streamline Swab Booth™

This booth is designed for the safe and efficient testing of persons under investigation (PUI) and persons under monitoring (PUM) with COVID-19 like symptoms.

It comes either as a positive or negative single booth that can be utilized either indoors or outdoors. It can be configured to be IP55 rated (minimum) but the client must select it at the time of purchase.

Streamline swab booths are constructed with a powder coated EG steel exterior. The coat* it utilizes is Esco ISOCIDE™ which is impregnated with a proprietary chemical for antimicrobial effect. This coating can also withstand disinfection/biodecontamination processes.

The same coating is used in our Biological Safety Cabinets and other laboratory/biotechnology equipment, hence, its efficiency has been tested by various Pharma/Biopharma institutions.

Four (4) units of SSBTM fit inside a 20ft container equipped with a working space and storage medial refrigerators.

SSBTM Design

- IP55 rating (for outdoor usage)
- PUI will always be seated for swabbing if the healthcare worker is inside
- Booth height:
 - » Internal: 2050mm
 - » External: 2250mm
- Mirror sheet inside PUI booth
- With two (2) magnehelic gauges:
 - » Monitoring filter load
 - » Internal booth pressure
- Wheel mountings on the side of the unit (can be easily removed)
 - » Floor must be levelled
- Retrofit UV and EOS
- UV-C interlock without the need for key switch similar to pass box
- Biodecontamination system for negatively pressured booths
- Cheaper corner shelf for positively pressured booths
- Glazings and doors are made from UV-absorbent and antiscratch polycarbonate materials
 - » Resistant to majority of disinfection solutions
- SSBTM standard shipment: assembled, with option to ship out disassembled as per client facility requirements.
 - » For the Assembled and disassembled option, kindly state to be specified in Purchase Order, Invoice, and Factory Works Order

- Door placement*:
- *Note: Client has to select prior to placing order
 - » Front of the unit In the event the door is placed on the front, pre-filters are integrated above the door (G4 pre-filters are easily replaceable).
 - » Side of the unit
- x2 LED lights for adequate lighting within the booths which share a single switch with blower's on/off switch
- Single cord plug 13 amp connection
- Cost effective and fast to deploy, Esco Aster Production cycle Is 50 units per week

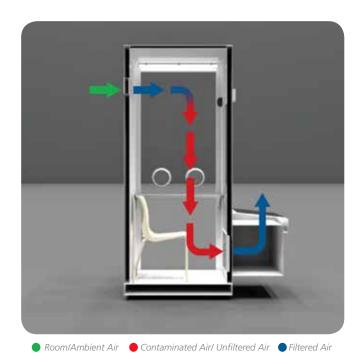
Air Flow System

Air will travel inside the booth via a linear bar grille with an adjustable damper located on top of the unit.

This air grille is equipped with G4 pre-filters to remove any coarse particles in the air.

Air will then flow downwards to wash the patient with filtered air and remove any residual particles in the booth.

Then the self-compensating ECM blower will pull that air towards the rear of the booth, causing it to pass through a set of HEPA filters before being exhausted out of the unit and into the environment.







SSB™ for PUI (Negative Pressure)

Negative pressured booths operate at -10 Pa (minimum).

Negative pressure single booths are ideal for the self-collection of samples from either swabs or saliva while providing an enclosed environment. This design ensures a reduced potential viral load within the air to provide protection to the environment.

A healthcare worker located outside can speak to the PUI via an integrated intercom as required.

Negative Pressure Booth Added Features:

- Inbuilt camlocks in negative pressure booths allow easy biodecontamination of terminal HEPA filters and allow the ease of developing biodecontamination cycles via easy placement of chemical indicators
- Esco exhaust systems are utilizing self compensating ECM Blowers which automatically adjust according to the filter load
- ECM closed loop self-compensating fans maintain the negative pressure at set point
- Optional UV-C surface decontamination
- Ceiling mounted fans or air conditioners for cooling down internal environment

SSB™ for HCW (Positive Pressure)

Positive pressured booths operate at +10 Pa (minimum).

Positive pressure single booths are ideal for healthcare workers (HCWs) and comes with a sealed closed environment with additional glove ports. This provides absolute protection for taking swabs from PUIs.

Healthcare workers can communicate to PUIs via an integrated intercom to provide instructions as required.

Positive Pressure Booth Added Features:

- Optional UV-C surface decontamination
- Ceiling mounted fans or air conditioners for cooling down internal environment

Features for Positive and Negative Single Swab Booths™

- Integrated caster wheels/levelling feet
- Mirrorsheets placed inside.
- 2 way intercom
- Standard gloveports in positive and negative version (for assistance).
- Low cost corner shelving.
- UV and Electrical outlet reftrofit.
- Enhanced electrical safety with individual RCBO



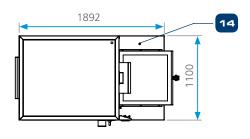


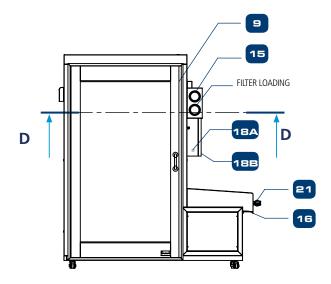


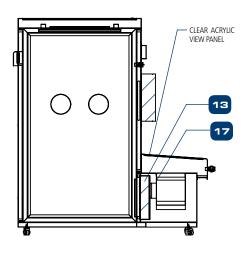


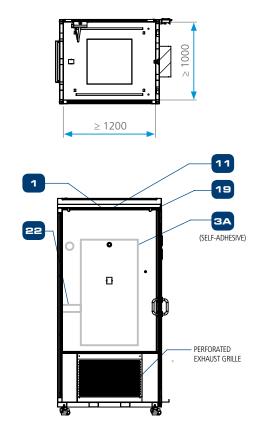
SSB™ for PUI (Negative Pressure)

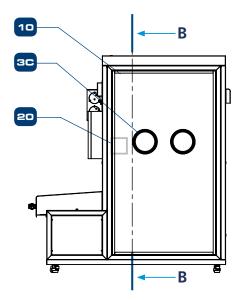
GA Drawing

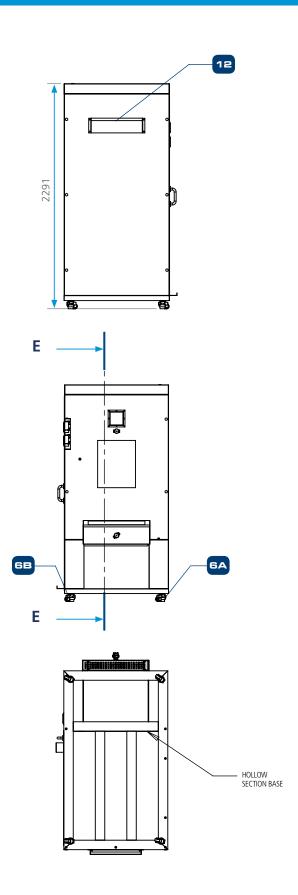


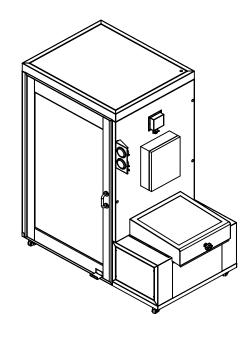












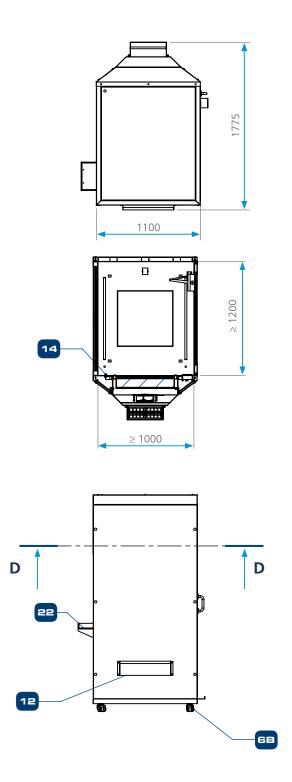
- 1. NEGATIVE PRESURE ROOM
- 3A. MIRROR
- 3C. DETACHABLE GLOVE PORT VISOR (OPTIONAL)
- 6A. LEVELLING FEET
- 6B. BASE WITH PROVISION FOR CASTER CUM LEVELLERS
- 9. ALUMINUM DOORS WITH DOOR CLOSER
- 10. ACRYLIC PANEL
- 11. CEILING MOUNTED CIRCULATION FAN PROVISION
- 12. LINE BAR GRILLE (ADJUSTABLE DAMPER) WITH G4 PRE-FILTER
- 13. EXHAUST HEPA FILTER WITH SAFE CHANGE
- 14. FILTER INTEGRITY TEST PORTS
- 15. MAGNEHELIC GAUGE
- 16. ADJUSTABLE EXHAUST DAMPER
- 17. RBM BLOWER (COMPENSATING)
- 18A. POWER INLET
- 18B. IP55 DISTRIBUTION PANEL
- 19. T5 LED TUBE
- 20. INTERCOM
- 21. DECONTAMINATION PORTS
- 22. RACK/LEDGE

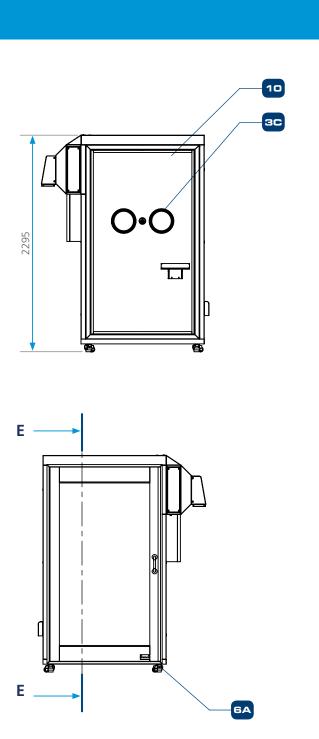


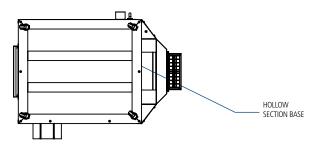


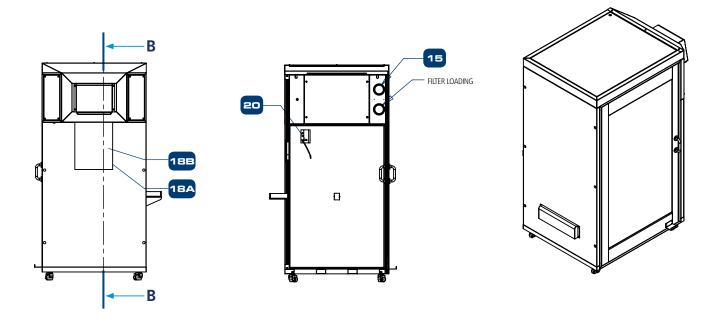
SSB™ for HCW (Positive Pressure)

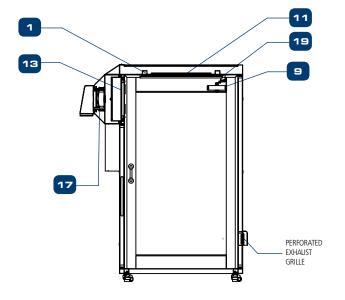
GA Drawing











- 1. POSITIVE PRESURE ROOM
- 3C. DETACHABLE GLOVE PORT VISOR (OPTIONAL)
- 6A. LEVELLING FEET
- 6B. BASE WITH PROVISION FOR CASTER CUM LEVELLERS
- 9. ALUMINUM DOORS WITH DOOR CLOSER
- 10. POLYCARBONATE PANEL
- 11. CEILING MOUNTED CIRCULATION FAN PROVISION
- 12. LINE BAR GRILLE (ADJUSTABLE DAMPER) WITH G4 PRE-FILTER
- 13. INLET HEPA FILTER
- 14. FILTER INTEGRITY TEST PORTS
- 15. MAGNEHELIC GAUGE
- 17. ECM BLOWER
- 18A. POWER INLET
- 18B. IP55 DISTRIBUTION PANEL
- 19. T5 LED TUBE
- 20. INTERCOM
- 22. RACK/LEDGE





SSB-PAF-I2-234-G1														
Model SSB™		Chamber Pressure		ЕН		Door Position		Usage		Voltage		Accessories		Gloveport
Streamline Swab Booth™	Р	Postive with Healthcare Worker Inside	А	2,500	F	Front (filter integrated in door)	ı	Indoors (normal non IP rated panel)	1	220-240, AC, 50Hz, 1Ø	1	Ceiling Fan	1	NIL with blanked cutout can retrofit iris or normal gloveports
	N	Negative with PUI Inside for Self Swab	В	2,000	L	Left	0	Outdoors (IP55 rated panel provided and electricals)	2	110-130, AC, 60Hz, 1Ø	2	Retrofit UV Option	G1	Glove port at height 1100mm
					R	Right	Е	Enhanced Panel with individual RCBO	3	220-240, AC, 60Hz, 1Ø	3	EOS 1x or 2x*	G2	Glove port at height 1300mm
									7	100 VAC, 50/60Hz	4	Intercom		
									8	220-240 VAC, 50/60Hz	5	Window aircon		
									9	110-130 VAC, 60Hz	6	Customized		

*Please specify number of EOS

SSB™ shipment options:

- Assembled
- Disassembled
 - » Kindly state to be specified in Purchase Order, Invoice, and Factory Works Order



Esco Aster Pte. Ltd. #02-09 Block 67 Ayer Rajah Crescent Singapore 139950 • Tel +65 6251 9361 mail@escoaster.com • www.escoaster.com

Esco Micro Pte. Ltd.
21 Changi South Street 1, Singapore 486777
Tel +65 6542 0833 • Fax +65 6542 6920
mail@escoglobal.com • www.escoglobal.com





