Laminar Flow Clean Benches, Horizontal and Vertical

The Leading Solution for Research Laboratories
Esco Experience

Esco is the world leader in premium laminar flow clean benches for the global life sciences market. Since 1978, Esco has installed tens of thousands of laminar flow clean benches providing reliable protection for samples and work processes for a multitude of applications.

Esco laminar flow clean benches are the premium selection for the discerning researcher, offering a combination of value, high quality construction, low operating noise levels, and a wide product range to suit all budgets, from the industry leader.

<table>
<thead>
<tr>
<th>Standards Compliance</th>
<th>Cabinet Performance</th>
<th>Air Quality</th>
<th>Filtration</th>
<th>Electrical Safety</th>
</tr>
</thead>
</table>

* Type-tested for cross-contamination and product protection using the microbiological testing methods adapted from this biological safety cabinet standard.

Airstream Horizontal Laminar Flow Clean Bench, Model AHC-4D. Shown with optional caster wheels stand, ergonomic lab chair and footrest.
Horizontal and Vertical Laminar Flow Clean Benches

Esco Airstream Laminar Flow Clean Benches are available in both horizontal and vertical flow models. In both models, air is taken in from above the cabinet and passed through a ULPA filter.

- In horizontal flow models, filtered air is then passed through the main chamber of the clean bench in a horizontal laminar (unidirectional) air stream and is exhausted through the front opening of the cabinet.
- In vertical flow models, filtered air is passed through the main chamber of the clean bench in a vertical laminar (unidirectional) air stream before being exhausted through the front opening of the clean bench.

In horizontal laminar flow clean benches (AHC) there is a slightly reduced level of turbulence compared to vertical flow clean benches (AVC) due to the airflow not striking the work surface. However, vertical laminar flow clean benches generate less turbulence around large pieces of equipment as compared to horizontal laminar flow clean benches.

Save Time and Money, Sentinel™ Delta Microprocessor Monitors Airflow in Real Time to Prevent Sample Contamination

- Touchpad data entry buttons permit control settings and access to default settings.
- Digital read-out with alpha-numeric display indicates all input, status and alarm functions.
- All functions can be user activated through touch-pad programming access; see Operations Manual.

- Color coded indicator lamps display green for fan operation, fluorescent lights and electrical outlet; and red for caution (UV lamp ON).

Esco Sentinel Delta Microprocessor Control System, Programmable

When programmed ON, an airflow alarm warns of deviations from normal velocities.

Digital read-out with alpha-numeric display indicates all input, status and alarm functions.

Touchpad data entry buttons permit control settings and access to default settings.

Horizontal and Vertical Laminar Flow Clean Benches

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- In horizontal flow models, filtered air is then passed through the main chamber of the clean bench in a horizontal laminar (unidirectional) air stream and is exhausted through the front opening of the cabinet.
- In vertical flow models, filtered air is passed through the main chamber of the clean bench in a vertical laminar (unidirectional) air stream before being exhausted through the front opening of the clean bench.

Airstream Horizontal Laminar Flow Clean Bench, Model AHC-4D™ Shown with optional caster wheels stand. Available in 0.6, 0.9, 1.2, 1.5 and 1.8m widths (2’, 3’, 4’, 5’ and 6’).

Airstream Vertical Laminar Flow Clean Bench, Model AVC-4D™ Shown with optional caster wheels stand. Available in 0.6, 0.9, 1.2, 1.5 and 1.8m widths (2’, 3’, 4’, 5’ and 6’).
Airstream, Horizontal Laminar Flow Clean Benches
Provide Product Protection

High Performance Blower System
German made ebm-papst® permanently lubricated, centrifugal motor/blowers with external rotor designs. Motors selected for energy efficiency, compact design, and flat profile. Completely integrated assembly optimizes motor cooling. All rotating parts balanced for smooth, quiet, vibration-free operation.

ULPA Filtration System
Swedish Camfil Farr® ULPA filters operate at a typical efficiency of >99.999% at 0.1 to 0.3 micron sizes, providing superior product protection over conventional HEPA filters.

User Interface
An angled front, curved work surface front edge, and glass sides promote ergonomics.

Built-In Protection
External surfaces are powder coated with Esco ISOCIDE® to eliminate 99.9% of surface bacteria within 24 hours of exposure.
ULPA filters (per IEST-RP-CC-001.3) tested to a typical efficiency of >99.999% for 0.1 to 0.3 micron particles are better than HEPA filters. ULPA filters last as long as conventional HEPA filters and have similar replacement costs.

All Esco laminar flow clean benches provide ISO Class 3 air cleanliness within the work zone as per ISO 14644-1, significantly cleaner than the usual Class 5 classification on clean benches offered by the competition.

The intelligent blower system maintains airflow as the filter becomes loaded, ensuring optimum efficiency and product protection.

An additional disposable pre-filter traps large particles in the inflow air prior to reaching the main filter, protecting against damage and prolonging filter life.

All Esco products are manufactured for the most demanding laboratory applications. All components are designed for maximum chemical resistance and enhanced durability for a long service life. The main body of the clean bench is constructed of industrial-grade electro-galvanized steel.

One piece formed stainless steel work surface with a curved front edge is designed for maximum operator comfort.

Built-in warm white, electronically ballasted, 5000k lighting provides excellent illumination of the work zone and reduces operator fatigue. The reliable lighting system is zero-flicker and instant start.

Esco Laminar Flow Clean Benches have been tested for cross-contamination and product protection using microbiological test methods specified in EN12469.

Each clean bench is individually factory tested for safety and performance in accordance with international standards.

All electrical components are UL listed or UL recognized, ensuring superior electrical safety for the operator.

Esco ISOCIDE™ antimicrobial coating on all painted surfaces.

Key Features

- ULPA filters (per IEST-RP-CC-001.3) tested to a typical efficiency of >99.999% for 0.1 to 0.3 micron particles are better than HEPA filters. ULPA filters last as long as conventional HEPA filters and have similar replacement costs.
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- Each clean bench is individually factory tested for safety and performance in accordance with international standards.
- All electrical components are UL listed or UL recognized, ensuring superior electrical safety for the operator.
- Esco ISOCIDE™ antimicrobial coating on all painted surfaces.

**Sentinel™ Delta Microprocessor Control System**

Soft touch controls for blower, light, outlet and UV are easy to clean. A temperature-compensated air velocity sensor and real-time display allows airflow to be monitored more accurately compared with conventional pressure gauges.

**Work Top**

The spill-retaining work top design with a recessed central area contains accidental liquid spills.

**Proven Product Protection**

Horizontal laminar air flow with ULPA filtration, >99.999% at 0.1 to 0.3 microns, provides superior product protection.

**Esco Filter Efficiency**

Esco clean benches use ULPA filters (per IEST-RP-CC001.3) instead of conventional HEPA filters commonly found in laminar flow clean benches. While HEPA filters offer 99.99% typical efficiency at 0.3 micron level, ULPA filters provide 99.999% typical efficiency for particle sizes of 0.1 to 0.3 micron level.
Model AHC (D-Series), Airstream Horizontal Laminar Flow Clean Bench Technical Specifications

1. Pre-filter
2. Blower
3. Fluorescent lamp
4. UV light Retrofit Kit provision
5. IV bar Retrofit Kit provision
6. Optional front cover
7. Service fixture Retrofit Kit provision (2 holes on each side)
8. ULPA filter
9. Tempered glass side panels
10. Esco Sentinel™ Delta microprocessor control system
11. Standard electrical outlet Retrofit Kit provision
12. Stainless steel work top

Warranty
All Esco Airstream, vertical and horizontal flow clean benches are covered by an extended 3 year warranty, excluding consumable parts and accessories. Contact your local Sales Representative for warranty details.

Accessories and Options
Esco offers a variety of options and accessories to meet local applications. Contact Esco or your local Sales Representative for ordering information.

Support Stands
- Fixed height, available 711 mm (28") or 860 mm (34")
  - With leveling feet (SPL)
  - With casters (SPC)
- Adjustable height, hydraulic range 711 mm (28") to 860 mm (34")
  - Manual or electrical lift (SPM)
  - With casters

Electrical Outlets and Utility Fixtures
- Electrical outlet, ground fault, North America
- Electrical outlet, Euro/Worldwide
- Petcock (air, gas, vacuum)
  - North America (American) style
  - Euro/Worldwide style DIN 12898, DIN 12919, DIN 3537

Cabinet Accessories
- Germicidal UV lamp
- Transparent front cover (recommended when UV lamp is used)
- PVC armrest
- Height-adjustable lab chair
- Ergonomic foot rest
- IV bar, with hooks
**General Specifications, Airstream Horizontal Laminar Flow Clean Benches**

**Note to customer:** Insert electrical voltage number into last model number digit _ when ordering.

<table>
<thead>
<tr>
<th>Model</th>
<th>AHC-2D</th>
<th>AHC-3D</th>
<th>AHC-4D</th>
<th>AHC-5D</th>
<th>AHC-6D</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nominal Size</td>
<td>0.6 meters (2')</td>
<td>0.9 meters (3')</td>
<td>1.2 meters (4')</td>
<td>1.5 meters (5')</td>
<td>1.8 meters (6')</td>
</tr>
<tr>
<td>External Dimensions (W x D x H) Without Base Stand</td>
<td>730 x 797 x 1105 mm (28.7&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>730 x 797 x 1105 mm (28.7&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>1035 x 797 x 1105 mm (40.7&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>1340 x 797 x 1105 mm (52.8&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>1645 x 797 x 1105 mm (64.8&quot; x 31.4&quot; x 43.5&quot;)</td>
</tr>
<tr>
<td>With Optional Base Stand, 711 mm (28&quot;) type</td>
<td>730 x 797 x 1105 mm (28.7&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>730 x 797 x 1105 mm (28.7&quot; x 31.4&quot; x 43.5&quot;)</td>
<td>1035 x 797 x 1105 mm (40.7&quot; x 31.4&quot; x 43.5&quot;)</td>
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<td>1645 x 797 x 1105 mm (64.8&quot; x 31.4&quot; x 43.5&quot;)</td>
</tr>
<tr>
<td>Internal Work Area, Dimensions (W x D x H)</td>
<td>575 x 625 x 575 mm (22.6&quot; x 24.6&quot; x 22.6&quot;)</td>
<td>880 x 625 x 575 mm (34.6&quot; x 24.6&quot; x 22.6&quot;)</td>
<td>1185 x 625 x 575 mm (46.7&quot; x 24.6&quot; x 22.6&quot;)</td>
<td>1490 x 625 x 575 mm (58.7&quot; x 24.6&quot; x 22.6&quot;)</td>
<td>1795 x 632 x 575 mm (70.7&quot; x 24.9&quot; x 22.6&quot;)</td>
</tr>
<tr>
<td>Internal Work Area, Space</td>
<td>0.36 m² (3.87 sq.ft)</td>
<td>0.55 m² (5.92 sq.ft)</td>
<td>0.74 m² (7.96 sq.ft)</td>
<td>0.94 m² (10.11 sq.ft)</td>
<td>1.13 m² (12.16 sq.ft)</td>
</tr>
<tr>
<td>Average Airflow Velocity</td>
<td>0.45 m/s (90 fpm) at initial setpoint</td>
<td></td>
<td></td>
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<tr>
<td>Air Volume</td>
<td>531 m³/h (313 cfm)</td>
<td>815 m³/h (480 cfm)</td>
<td>1099 m³/h (647 cfm)</td>
<td>1383 m³/h (814 cfm)</td>
<td>1667 m³/h (981 cfm)</td>
</tr>
<tr>
<td>ULPA Filter Typical Efficiency</td>
<td>&gt;99.999% at particle size between 0.1 to 0.3µm</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Sound Emission Per IEST-RP-CC002.2*</td>
<td>&lt;54 dBA</td>
<td>&lt;55 dBA</td>
<td>&lt;57 dBA</td>
<td>&lt;59 dBA</td>
<td>&lt;60 dBA</td>
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<tr>
<td>Fluorescent Lamp Intensity At Zero Ambient</td>
<td>&gt;1550 Lux (&gt;144 foot candles)</td>
<td>&gt;1600 Lux (&gt;149 foot candles)</td>
<td>&gt;1800 Lux (&gt;182 foot candles)</td>
<td>&gt;1600 Lux (&gt;149 foot candles)</td>
<td>&gt;1600 Lux (&gt;149 foot candles)</td>
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<tr>
<td>Cabinet Construction</td>
<td>Main Body</td>
<td>1.2 mm (0.05&quot;) 18 gauge electrogalvanised steel with white oven-baked epoxy-polyester powder-coated finish.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Work Zone</td>
<td>1.2 mm (0.05&quot;) 18 gauge stainless steel, grade 304, with 4B finish</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Side Walls</td>
<td>UV absorbing tempered glass, 5 mm (0.2&quot;), colorless and transparent</td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Electrical**</td>
<td>220-240V, AC, 50Hz, 1Ø</td>
<td>AHC-2D1</td>
<td>AHC-3D1</td>
<td>AHC-4D1</td>
<td>AHC-5D1</td>
</tr>
<tr>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
</tr>
<tr>
<td>Outlet Amp Fuse</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
</tr>
<tr>
<td>Full Load Amps</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
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<tr>
<td>BTU/ Hr</td>
<td>1024</td>
<td>1160</td>
<td>1331</td>
<td>1365</td>
<td>2900</td>
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<tr>
<td>110-120V, AC, 60Hz, 1Ø</td>
<td>AHC-2D2</td>
<td>AHC-3D2</td>
<td>AHC-4D2</td>
<td>AHC-5D2</td>
<td>AHC-6D2</td>
</tr>
<tr>
<td>580 W/ 6.5A</td>
<td>650 W/ 6.5A</td>
<td>700 W/ 6.5A</td>
<td>700 W/ 6.5A</td>
<td>700 W/ 6.5A</td>
<td></td>
</tr>
<tr>
<td>Outlet Amp Fuse</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
</tr>
<tr>
<td>Full Load Amps</td>
<td>11.5A</td>
<td>11.5A</td>
<td>11.5A</td>
<td>11.5A</td>
<td>10.5A</td>
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<td>BTU/ Hr</td>
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<tr>
<td>220-240V, AC, 50Hz, 1Ø</td>
<td>AHC-2D3</td>
<td>AHC-3D3</td>
<td>AHC-4D3</td>
<td>AHC-5D3</td>
<td>AHC-6D3</td>
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<td>300 W/ 2A</td>
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<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td>300 W/ 2A</td>
<td></td>
</tr>
<tr>
<td>Outlet Amp Fuse</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
</tr>
<tr>
<td>Full Load Amps</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
<td>10A</td>
</tr>
<tr>
<td>BTU/ Hr</td>
<td>1024</td>
<td>1160</td>
<td>1331</td>
<td>1365</td>
<td>2900</td>
</tr>
<tr>
<td>Net Weight***</td>
<td>101 kg (223 lbs)</td>
<td>125 kg (276 lbs)</td>
<td>150 kg (331 lbs)</td>
<td>169 kg (373 lbs)</td>
<td>190 kg (419 lbs)</td>
</tr>
<tr>
<td>Shipping Weight***</td>
<td>136 kg (301 lbs)</td>
<td>164 kg (362 lbs)</td>
<td>190 kg (429 lbs)</td>
<td>240 kg (529 lbs)</td>
<td>263 kg (580 lbs)</td>
</tr>
<tr>
<td>Shipping Dimensions, Maximum (W x D x H)***</td>
<td>860 x 860 x 1460 mm (33.8&quot; x 33.8&quot; x 57.5&quot;)</td>
<td>1120 x 860 x 1460 mm (44&quot; x 33.8&quot; x 57.5&quot;)</td>
<td>1430 x 860 x 1460 mm (56.3&quot; x 33.8&quot; x 57.5&quot;)</td>
<td>1720 x 860 x 1460 mm (67.7&quot; x 33.8&quot; x 57.5&quot;)</td>
<td>2050 x 860 x 1460 mm (80.7&quot; x 33.8&quot; x 57.5&quot;)</td>
</tr>
<tr>
<td>Shipping Volume, Maximum***</td>
<td>1.08 m³ (38 cu.ft)</td>
<td>1.41 m³ (50 cu.ft)</td>
<td>1.80 m³ (64 cu.ft)</td>
<td>2.16 m³ (76 cu.ft)</td>
<td>2.57 m³ (90 cu.ft)</td>
</tr>
</tbody>
</table>

* Noise reading in open field condition/ anechoic chamber.
** Additional voltages may be available; contact Esco for ordering information.
*** Clean bench only; excludes optional stand.
Airstream, Vertical Laminar Flow Clean Benches

Provide Product Protection

High Performance Fan System
German made ebm-papst® permanently lubricated, centrifugal motor/fans with external rotor designs. Motors selected for energy efficiency, compact design, and flat profile. Completely integrated assembly optimizes motor cooling. All rotating parts balanced for smooth, quiet, vibration-free operation.

ULPA Filtration System
Swedish Camfil Farr® ULPA filters operate at a typical efficiency of >99.999% at 0.1 to 0.3 micron sizes, providing superior product protection over conventional HEPA filters.

User Interface
An angled front, curved work surface front edge, and glass sides promote ergonomics. The powder coated work zone rear wall eliminates harsh reflections which may be associated with conventional stainless steel interiors. The vertical air flow design minimizes direct airflow which may lead to dry eyes and fatigue on horizontal flow models.

Proven Product Protection
Vertical laminar air flow with ULPA filtration, >99.999% at 0.1 to 0.3 microns, provides superior product protection.
ULPA filters (per IEST-RP-CC-001.3) tested to a typical efficiency of >99.999% for 0.1 to 0.3 micron particles are better than HEPA filters. ULPA filters last as long as conventional HEPA filters and have similar replacement costs.

All Esco laminar flow clean benches provide ISO Class 3 air cleanliness within the work zone as per ISO 14644.1, significantly cleaner than the usual Class 5 classification on clean benches offered by the competition.

The backward curved wheel with external rotor motor delivers class-leading energy efficiency for lower operating costs.

An additional disposable pre-filter traps large particles in the inflow air prior to reaching the main filter, protecting against damage and prolonging filter life.

All Esco products are manufactured for the most demanding laboratory applications. All components are designed for maximum chemical resistance and enhanced durability for a long service life. The main body of the clean bench is constructed of industrial-grade electrogalvanized steel.

One piece formed stainless steel work surface with a curved front edge is designed for maximum operator comfort.

Built-in warm white, electronically ballasted, 5000k lighting provides excellent illumination of the work zone and reduces operator fatigue. The reliable lighting system is zero-flicker and instant start.

Esco Laminar Flow Clean Benches have been tested for cross-contamination and product protection using microbiological test methods specified in EN12469. Each clean bench is individually factory tested for safety and performance in accordance with international standards.

All electrical components are UL listed or UL recognized, ensuring superior electrical safety for the operator.

Esco ISOCIDE® antimicrobial coating on all painted surfaces.

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**Key Features**

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- Esco Laminar Flow Clean Benches have been tested for cross-contamination and product protection using microbiological test methods specified in EN12469.

- Each clean bench is individually factory tested for safety and performance in accordance with international standards.

- All electrical components are UL listed or UL recognized, ensuring superior electrical safety for the operator.

- Esco ISOCIDE® antimicrobial coating on all painted surfaces.
Model AVC (D-Series), Airstream Vertical Laminar Flow Clean Bench Technical Specifications

Warranty
All Esco Airstream, vertical and horizontal flow clean benches are covered by an extended 3 year warranty, excluding consumable parts and accessories. Contact your local Sales Representative for warranty details.

Accessories and Options
Esco offers a variety of options and accessories to meet local applications. Contact Esco or your local Sales Representative for ordering information.

Support Stands
- Fixed height, available 711 mm (28") or 860 mm (34")
  - With leveling feet (SPL)
  - With casters (SPC)
- Adjustable height, hydraulic range 711 mm (28") to 860 mm (34")
  - Manual or electrical lift (SPM)
  - With casters

Electrical Outlets and Utility Fixtures
- Electrical outlet, ground fault, North America
- Electrical outlet, Euro/Worldwide
- Petcock (air, gas, vacuum)
  - North America (American) style
  - Euro/Worldwide style DIN 12898, DIN 12919, DIN 3537

Cabinet Accessories
- Germicidal UV lamp
- Transparent front cover (recommended when UV lamp is used)
- PVC armrest
- Height-adjustable lab chair
- Ergonomic foot rest
- IV bar, with hooks
## General Specifications, Airstream Vertical Laminar Flow Clean Benches

**Note to customer:** Insert electrical voltage number into last model number digit _ when ordering.

### Model Specifications

<table>
<thead>
<tr>
<th>Nominal Size</th>
<th>AVC-2D_</th>
<th>AVC-3D_</th>
<th>AVC-4D_</th>
<th>AVC-5D_</th>
<th>AVC-6D_</th>
</tr>
</thead>
<tbody>
<tr>
<td>Without Base Stand</td>
<td>730 x 770 x 1250 mm</td>
<td>1035 x 770 x 1250 mm</td>
<td>1340 x 770 x 1250 mm</td>
<td>1645 x 770 x 1250 mm</td>
<td>1950 x 770 x 1250 mm</td>
</tr>
<tr>
<td>28.7” x 30.3” x 49.2”</td>
<td>40.7” x 30.3” x 49.2”</td>
<td>52.8” x 30.3” x 49.2”</td>
<td>64.8” x 30.3” x 49.2”</td>
<td>76.8” x 30.3” x 49.2”</td>
<td></td>
</tr>
</tbody>
</table>

| With Optional Stand, 711 mm (28”) type | 730 x 770 x 1961 mm | 1035 x 770 x 1961 mm | 1340 x 770 x 1961 mm | 1645 x 770 x 1961 mm | 1950 x 770 x 1961 mm |
| 28.7” x 30.3” x 77.2” | 40.7” x 30.3” x 77.2” | 52.8” x 30.3” x 77.2” | 64.8” x 30.3” x 77.2” | 76.8” x 30.3” x 77.2” |

### External Dimensions (W x D x H)

| Without Base Stand | 730 x 770 x 1250 mm | 1035 x 770 x 1250 mm | 1340 x 770 x 1250 mm | 1645 x 770 x 1250 mm | 1950 x 770 x 1250 mm |
| 28.7” x 30.3” x 49.2” | 40.7” x 30.3” x 49.2” | 52.8” x 30.3” x 49.2” | 64.8” x 30.3” x 49.2” | 76.8” x 30.3” x 49.2” |

| With Optional Stand, 711 mm (28”) type | 730 x 770 x 1961 mm | 1035 x 770 x 1961 mm | 1340 x 770 x 1961 mm | 1645 x 770 x 1961 mm | 1950 x 770 x 1961 mm |
| 28.7” x 30.3” x 77.2” | 40.7” x 30.3” x 77.2” | 52.8” x 30.3” x 77.2” | 64.8” x 30.3” x 77.2” | 76.8” x 30.3” x 77.2” |

### Internal Work Area, Dimensions (W x D x H)

| Internal Work Area, Dimensions | 660 x 700 x 695 mm | 965 x 700 x 695 mm | 1270 x 700 x 695 mm | 1575 x 700 x 695 mm | 1880 x 700 x 695 mm |
| 26.0” x 27.6” x 27.4” | 38.0” x 27.6” x 28.3” | 50.0” x 27.6” x 28.3” | 62.0” x 27.6” x 28.3” | 74.0” x 27.6” x 28.3” |

### Internal Work Area, Space

<table>
<thead>
<tr>
<th>Average Airflow Velocity</th>
<th>Air Volume</th>
<th>Air Volume</th>
<th>Air Volume</th>
<th>Air Volume</th>
<th>Air Volume</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.45 m/s (90 fpm) at initial setpoint</td>
<td>603 m³/h (355 cfm)</td>
<td>1204 m³/h (709 cfm)</td>
<td>1506 m³/h (886 cfm)</td>
<td>1806 m³/h (1063 cfm)</td>
<td></td>
</tr>
</tbody>
</table>

### Clean bench Construction

| Main Body | 1.2 mm (0.05”) | UV absorbing tempered glass, 5 mm (0.2”), colorless and transparent |
| Work Zone | 1.2 mm (0.05”) | UV absorbing tempered glass, 5 mm (0.2”), colorless and transparent |
| Side Walls | 1.2 mm (0.05”) | UV absorbing tempered glass, 5 mm (0.2”), colorless and transparent |

### Electrical

<table>
<thead>
<tr>
<th>220-240V, AC, 50Hz, 1Ø</th>
<th>220-240V, AC, 60Hz, 1Ø</th>
<th>220-240V, AC, 50Hz, 1Ø</th>
<th>110-120V, AC, 60Hz, 1Ø</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cabinet Power/Amp</td>
<td>350 W/2A</td>
<td>370 W/2A</td>
<td>380 W/2A</td>
</tr>
<tr>
<td>Outlet Amp</td>
<td>5A</td>
<td>5A</td>
<td>5A</td>
</tr>
<tr>
<td>Full Load Amps</td>
<td>7A</td>
<td>7A</td>
<td>7A</td>
</tr>
<tr>
<td>BTU/Hr</td>
<td>1194</td>
<td>1262</td>
<td>1297</td>
</tr>
<tr>
<td>Net Weight***</td>
<td>106 kg (234 lbs)</td>
<td>127 kg (280 lbs)</td>
<td>152 kg (335 lbs)</td>
</tr>
<tr>
<td>Shipping Weight***</td>
<td>162 kg (357 lbs)</td>
<td>171 kg (377 lbs)</td>
<td>203 kg (452 lbs)</td>
</tr>
<tr>
<td>Shipping Dimensions, Maximum (W x D x H)***</td>
<td>860 x 860 x 1490 mm</td>
<td>1130 x 860 x 1490 mm</td>
<td>1430 x 860 x 1490 mm</td>
</tr>
<tr>
<td>Shipping Volume, Maximum***</td>
<td>1.10 m³ (38.8 cu.ft)</td>
<td>1.45 m³ (51.2 cu.ft)</td>
<td>1.83 m³ (64.6 cu.ft)</td>
</tr>
</tbody>
</table>

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* Additional voltages may be available; contact Esco for ordering information.  
** Clean bench only; excludes optional stand.  
*** Net Weight includes only clean bench.  
**** Shipping Weight includes all components and parts.  
***** Shipping Dimensions include all components and parts.
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