



Biosafety Cabinet type III

Construction: -

Biosafety Cabinet are basically constructed out of 1”~2” MS/S.S box bar and the exterior surface are covered with M.S. sheet/S.S sheet.

The surface of the Working table is made of S.S. sheet/ebonite sheet. The side panels of the working area are made of 5mm thick transparent glass.

Air flow and filtration: -

Laminar airflow principle involves double filtration of atmospheric air. The atmospheric air is drawn through pre-filter and is made to pass the Air through highly effective HEPA filter having efficiency rating as high as 99.99 % down to 0.1 micron thus retaining all airborne particles size of 0.1~0.3 micron and larger. Double filtered air blows through the worktable at a designed velocity of 90ft/min \pm 10%. The filters are made of U.k/U.S.A/JAPAN/GERMAN/ITALY.

Class III Type A2 Biological Safety Cabinet

Class III cabinets provide product, operator and environment protection. They are suitable for general microbiological work with agents assigned to biosafety levels 1, 2 and 3. Class III cabinets are recommended for most applications and are the most common and cost-effective systems available on the market today.

Like Class I biosafety cabinets, Class III cabinets have a stream of inward air moving into the cabinet. This is known as the inflow and it contains aerosols generated during microbiological manipulations. However, unlike Class I cabinets, the inflow on Class III. Cabinets is taken in through air grilles towards the front of the work surface nearest the operator. None of the unfiltered air infiltrates the actual working zone of the cabinet and therefore contamination of product samples is not a concern.

A feature unique to Class III BSCs is a vertical laminar (unidirectional) HEPA-filtered air stream that descends downward from the interior of the cabinet. This continuously flushes the cabinet interior of airborne contaminants and protects samples being handled within the cabinet from contamination. This is known as the down flow. Nearer to the level of the work surface, the down flow splits with some air entering grilles towards the back of the cabinet, with the remainder taken in through grilles across the horizontal work surface of the cabinet nearest the operator.

There are two major world standards for Class III Biological Safety Cabinets; US NSF49 Standard and European EU12469.

Blower motor assembly: -

Statically and dynamically balanced, direct drive Blower is designed to provide adequate air pressure over the entire surface of HEPA. The motor blower operates with minimum noise level i.e. lower than 65db and the vibration is less than 2.5um. The motor is imported from U.k/U.S.A/JAPAN/GERMAN/ITALY

U.V. Tube light assembly: -

A U.V. tube light is assembled in the working field to assure almost 100% microorganism free working area.

Power requirements: -

220volt, single phase, 50/60HZ AC supply, watt 250/375/750



Special requirements: -

Working table surface warmer: Temperature range 25~50 deg. Centigrade, Temperature controller: Digital.

Operating instruction: -

Turn the U.V. tube light and Blower motor switch on. After 15 minutes turn off the U.V. tube light and then start working.

Other requirements: -

Illumination: Florescent light- 40/20 watt. U.V. light- 30/15 watts

Table surface material: S.S.



Mode of payment: 50% of the total quoted value has to be paid with the work order. And other 50% will have to pay during the time of delivery.

N.B.: We will cover a warranty period of one year from date of installation for the above machinery (This warranty will not cover the electrical appliance).