# **STERICOX**

# **BIOSAFETY CABINET**

# **CLASS II TYPE A2**

Biosafety Cabinets are specialized workstations widely used in clinical, pharmaceutical, life science and industrial laboratories where experiments need highly contaminant free environment. Also known as biological safety cabinets and biohazard safety cabinets, these are made in three different class types such as Class 1, Class 2 and Class 3; in which Class 2 is widely used in microbiology laboratories because it provides protection to both product as well as personal. It is biosafety level factor which decides which bsc should be used in laboratory. These cabinets are considered safer than other clean benches because such BSCs effectively eliminate risks to operator / staff, samples and the environment from pathogenic biological agents (PBA) and microorganisms responsible for spreading airborne infection.



# WHY DO WE USE BIOSAFETY CABINET?

The purpose of using biosafety cabinet in microbiology laboratory is to protect laboratory personal as well as surrounding environment from exposure to biohazards while working with infectious agents.

## **BIOSAFETY CABINET APPLICATIONS**

There are many uses of bio safety cabinets such as chemotherapy preparation, drug formulation, and animal cell culture processing and in TB lab for manipulation of mycobacterium tuberculosis culture etc.

## DIFFERENT TYPES OF CLASS 2 BIOSAFETY CABINET

There are three types of class 2 biosafety cabinets are made. It is the type of work which decides which class 2 bsc should be used in laboratory. Below is short description about all types:

- ❖ Type A2: recirculate approximately 70% air and 30% exhaust
- ❖ Type B1: recirculate approximately 30% air and 70% exhaust
- ❖ Type B2: Does not recirculate but exhaust 100% air

We are Biosafety cabinet manufacturers in India. Having factory based in Delhi, the company has been manufacturing customized **Biosafety Cabinets Class II Type A2** and sell them at reasonable price throughout India and overseas market including African and Middle East countries. We have technicians, machinery and knowledge that capable us to serve you with your choice of Biosafety cabinet that may vary in dimensions, associated accessories and control points etc. Made of branded parts, these cabinets are highly effective to maintain maximum level of safety; hence, considered a necessary part of any research laboratory.





# **CONSTRUCTION**

These cabinets are ergonomically designed to provide long service life. Only thick metal sheets and pipes are used in construction so that you may get the finest and safest Biosafety Cabinet in the market today.

## **AIR CIRCULATION**

In order to minimize spread of airborne bacterial and viral organisms, the use of filter is crucial; therefore, we use 99.97% efficiency HEPA filters for particle size 0.3 microns in our biological class 2 type A2 safety cabinets. These air filters are of reputed brands in the market, economical in price and easily replaceable. ISO 5 / Class 100 quality, supply and exhaust through HEPA filters are done. Inflow velocity remains approx. 105 fpm (0.5 m/sec), while down flow velocity remains approx. 55 fpm (0.3 m/sec). 70 % air is re-circulated and 30% exhaust.

## **OTHER FITTINGS**

Our Biosafety cabinets are fitted with fluorescent lights outside working zone. UV lamps are fitted inside working zone in such a way that the operator cannot see them directly. An hour meter is connected to UV lamp. Electrical sockets are fitted to run any instrument under the working area; in addition, service fixtures for air, gas, vacuum and water are also fitted.

We also make biosafety cabinets class 2 type B1 and B2

#### **TECHNICAL SPECIFICATIONS**

| Sizes Available   | 2ft, 3ft, 4ft, 5ft and 6 ft                 |  |
|-------------------|---|--|
| Construction      | SS 304 /316 / Powder coated MS or GI sheet  |  |
| Work top          | SS 304 /316                                 |  |
| Controller        | ON/Off switches for Cabinet, Light & Blower |  |
| Air filtration    | HEPA filter 99.99% efficiency               |  |
| Air recirculation | 70% recirculation and 30% exhaust           |  |

| Average Airflow Velocity | Inflow: Minimum 0.45 m/s ( 90 FPM) at 8" front opening Down flow: 0.30 m/s ( 65 FPM)  |  |
|--------------------------|---|--|
| Fumigation               | In-built fumigation port  |  |
| Noise level              | Less than 60 decibel  |  |
| Standard Fittings        | <ul> <li>Magnehelic pressure gauge</li> <li>Fluorescent lamp</li> <li>UV light</li> </ul>   |  |
| Optional                 | <ul> <li>Microprocessor based controller system</li> <li>Digital display of real time inflow / down flow air velocities</li> <li>Alarm for variation in air flow and blocked blower</li> <li>Sash height alarm</li> <li>UV hour meter</li> <li>Virus burnout</li> <li>Service valves (gas, vacuum, air &amp; water)</li> <li>Electrical sockets</li> <li>Towel catch</li> <li>Differential pressure sensor</li> <li>Arm / elbow rest</li> <li>Drain pan on work bench</li> <li>Movable stand (wheels)</li> <li>Foot rest</li> <li>IV Bag Holder</li> <li>Support stand with leveling screws</li> <li>Calibration certificates</li> <li>NSF certification</li> </ul> |  |

# STANDARD SIZES / DIMENSIONS

| Model     | Dimension (Ft.) (W x D x H) | Dimension (mm) (W x D x H) |
|-----------|-----------------------------|----------------------------|
| STXBSC222 | 2 X 2 X 2                   | 610 x 610 x 610            |
| STXBSC322 | 3 x 2 x 2                   | 914 x 610 x 610            |
| STXBSC422 | 4 x 2 x 2                   | 1219 x 610 x 610           |
| STXBSC522 | 5 x 2 x 2                   | 1524 x 610 x 610           |
| STXBSC622 | 6 x 2 x 2                   | 1829 x 610 x 610           |



## STERICOX INDIA PRIVATE LIMITED

Address: Ground Floor A-106, KH No. 186

Street No. 15. South Gamri. Delhi 110053. India

Call Us :+918130134164
Email Us :info@stericox.com
Web :www.stericox.com