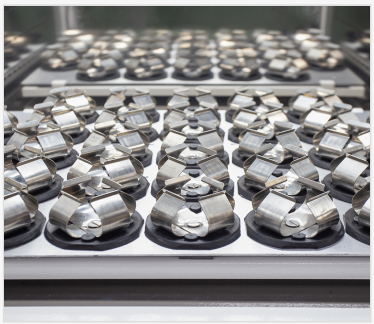
+55 (19) 2105-6161
comex@tecnal.com.br



SHAKER INCUBATOR

TE-424/1-2

Used for incubation of samples requiring orbital shaking, temperature control, illumination, and photoperiod management, such as culture media for microorganism growth and biochemical analysis.

João Leonardo Fustaino, nº 325 Distrito Industrial
Uninorte Piracicaba/SP-Brasil • CEP 13.413-102

+55 (19) 2105-6161
comex@tecnal.com.br

Technical Characteristics

TE-424/1-2

- Upper Incubator - temperature range: 15°C to 50°C;
- Temperature controller: Through 4.3” touch screen HMI, digital microprocessed with PID system ;
- Control accuracy: ±0.2°C;
- Homogeneity: ±1°C ;
- Shaking range: Orbital from 30 to 150 RPM;
- Shaking control: Through 4.3” touch screen HMI ;
- Shaking motor: 0.16 HP induction motor ;
- Compressor: Hermetic 1/5HP, with CFC-free 134-A gas;
- Circulation: Forced air ventilation;
- Safety: Automatic shaking shutdown when opening the door;
- Lighting: ON-OFF through photoperiod ;
- Photoperiod control: Through 4.3” touch screen HMI ;
- Lighting type: 12W 6500K LED lamp ;
- Number of lamps/LEDs: 4 LED lamps located at the top of the internal chamber ;
- Photoperiod: ON-OFF activation through HMI programming ;
- Timer: Shaking time control through 4.3” touch screen HMI ;
- Time scale: HH:MM;
- Door: Double glass door with gas filling for thermal insulation ;
- Internal chamber: Fully stainless steel with lighting ;
- Maximum lighting intensity: 5000 Lux at 250mm ;
- Cabinet: Carbon steel with anti-corrosion treatment and electrostatic painting;
- Lower Incubator - temperature range: 15°C to 50°C;
- Temperature controller: Through 4.3” touch screen HMI, digital microprocessed with PID system;
- Control accuracy: ±0.2°C ;
- Homogeneity: ±1°C ;
- Shaking range: Orbital from 30 to 150 RPM;
- Shaking control: Through 4.3” touch screen HMI;
- Shaking motor: 0.16 HP induction motor ;
- Compressor: Hermetic 1/5HP, with CFC-free 134-A gas ;
- Photoperiod: ON-OFF activation through HMI programming ;
- Timer: Shaking time control through 4.3” touch screen HMI;
- Time scale: HH:MM;
- Door: Double glass door with gas filling for thermal insulation;
- Internal chamber: Fully stainless steel with lighting ;
- Maximum lighting intensity: 5000 Lux at 250mm;
- Cabinet: Carbon steel with anti-corrosion treatment and electrostatic painting;
- Structure: Equipment installed in stacked configuration (2x);
- Minimum installation area of the set: W=915 x D=620 x H=1800 (mm) ;
- Internal dimensions: W=650 x D=460 x H=440 (mm) ;
- External dimensions: W=915 x D=620 x H=810 (mm);
- Set weight: 300Kg ;
- Set power: 2400W ;
- Voltage: 220V ±5% 60Hz (one outlet per equipment);
- Includes one plataform to choose from (per equipment): 31 clamps for 125 ml Erlenmeyer flasks or 20 clamps for 250 ml Erlenmeyer flasks or 13 clamps for 500 ml Erlenmeyer flasks or 06 clamps for 1000 ml Erlenmeyer flasks or 02 clamps for 3000 ml Erlenmeyer flasks;

+55 (19) 2105-6161
comex@tecnal.com.br

+55 (19) 2105-6161
comex@tecnal.com.br

Benefits and Advantages

- Stackable system that enables greater operating capacity with optimized laboratory space utilization
- Independent modules allowing simultaneous execution of different assays
- Suitable for studies requiring light intensity and photoperiod control, such as microalgae cultivation, photosensitive cultures, and biological assays requiring light exposure
- Microprocessor controller with PID system and RBC certification, providing greater thermal stability and reduced variation during testing
- PT-100 temperature sensor with high sensitivity and reading accuracy
- Temperature uniformity contributing to improved repeatability of results
- Flexibility for different sample volumes and tray configurations
- Double-glazed glass door that minimizes heat loss and allows sample observation without interfering with the process
- Forced air circulation system that improves temperature distribution inside the chamber
- Internal lighting system allowing visual monitoring of samples during testing
- Programmable photoperiod control enabling simulation of light and dark cycles
- Integrated timer for precise shaking time control
- Test programming without the need for constant operator intervention
- Automatic shaking shutdown when opening the door, increasing operational safety
- Touch-sensitive interface for easier operation and parameter adjustment
- Strict Quality Control, with inspections and testing ensuring optimal equipment performance, delivering safety and customer satisfaction
- Customer support available to answer questions and provide guidance regarding equipment operation and methodologies.