

## **Local Benchtop Ionizer- ION 85**



The Ion 85 and 85e Local Area Ionizing Blower controls static discharge in assembly, inspection, packaging areas, and intool wherever static build-up can cause contamination, ESD, material-handling problems or microprocessor lock-up.

Patented IsoStat technology makes the Ion 85 and 85e the most reliable ionizers available. IsoStat characteristics include small size and operation without grounding wires or cables while still maintaining ionizer balance. The Ion 85's internal emitter points are electrostatically shielded to eliminate field-induced charging. Steady-state DC ion emission to provide fast discharge with low airflow for greater operator comfort, the Ion 85's blower offers the best of IsoStat technology.

### **Features**

- ✱ IsoStat® Technology
- ✱ Steady-state DC ion emission
- ✱ 24 VDC or 24 VAC input
- ✱ Facility Monitoring System (FMS) interface
- ✱ Operational failure alarm (Ion 85e)
- ✱ Small footprint design with in-tool stand or benchtop stand

### **Benefits**





- ✱ Intrinsically balanced; no calibration needed
- ✱ Efficient ion delivery
- ✱ Connects directly to your process equipment's power source
- ✱ Integrates 4-20 mA current loop and relay output to your monitoring system
- ✱ Notification of any operational failures
- ✱ Takes up little workspace; cleanroom-compatible (minimizes disruption of laminar flow)

### **Enhanced Features**

In addition to the standard features on the Ion 85, the enhanced Ion 85e offers an alarm LED on the front of the blower that indicates a high voltage circuitry failure and a fivepin facility monitoring system (FMS) interface. The FMS interface provides a 4-20 mA current loop and relay output connection. Together with the 24 VDC input connection, the FMS output is situated on a convenient terminal block, designed for easy integration with your process equipment.

### **Power Options**

For increased flexibility, the Ion 85e can be directly powered by process equipment or 24 VDC/VAC power to fit the needs of your environment. Two transformers are available: 120 VAC/60 Hz (transformer 14-1320) or 230VAC/50 Hz (transformer 14-1330). (See Figure A)

<b>Input</b>	24 VDC ( $\pm 10\%$ ), 6 watts max. or 24 VAC ( $\pm 10\%$ ), 50-60 Hz, 6 watts max.
<b>Power Indicator</b>	Green power LED; red alarm LED available on Model Ion 85e
<b>Ion Emission</b>	Steady-state DC
<b>Emitter Points</b>	Tungsten wire; internally shielded;
<b>Airflow</b>	49 CFM, typical
<b>Ozone</b>	<0.005 ppm (24-hour accumulation)
<b>Mounting</b>	Small in-tool bracket/stand (1.8 x 5.1 in./45 x 129 mm); large benchtop stand (4.1 x 5.1 in./ 108 x 129 mm); both with 1/4" mounting hole and 10-32 truss head screws
<b>Dimensions</b>	5.3H x 5.0W x 2.5D inches (133 x 127 x 63 mm); small bracket base is 1.8" (45 mm); large stand base is 4.1" (108 mm).
<b>Weight</b>	21 oz (595g) with large stand
<b>Warranty</b>	2-year limited warranty
<b>Certifications</b>	CE (pending),  
<b>Ion 320 Wall Transformer</b>	
<b>Input Voltage</b>	120 VAC $\pm 10\%$ , 60 Hz
<b>Output</b>	24 VAC @450 mA
<b>Certifications</b>	
<b>Ion 330 Wall Transformer</b>	
<b>Input Voltage</b>	230 VAC, 50 Hz
<b>Output</b>	24 VAC @750 mA, $\pm 5\%$
<b>Dimensions</b>	2.8H x 2.5W x 1.9D in. (71H x 64W x 48D mm)
<b>Certifications</b>	CE
<b>Ion 322 Wall Transformer</b>	
<b>Input Voltage</b>	90-264 VAC, 50 Hz
<b>Output</b>	24 VAC @ 417 mA
<b>Dimensions</b>	1.4H x 2.1W x 3.4L in. (36H x 53W x 86L mm)
<b>Certifications</b>	 CE



**Figure A**

**Patented IsoStat Technology**  
 The ION 85's patented IsoStat technology guarantees intrinsically balanced ionization and eliminates complicated feedback circuits. Ionizers incorporating this technology never need calibration and require very little maintenance. IsoStat is based on a law of physics, Conservation of Charge, which states that charge cannot be created or destroyed in an isolated system. By isolating the ionizer's emitter points from ground, IsoStat ensures equal numbers of positive and negative ions.



The Ion 85 and 85e are offered with smaller in-tool stands (shown here) or larger benchtop stands.