

*Swedish Electrostatics*

PARTNERS IN TECHNOLOGY



Rimor have teamed up with Swedish Electrostatics, to offer a comprehensive high quality range of equipment for discharging, charging & measurement of electrostatic.

**The installation of an EFFECTIVE Anti Static system will provide your company with Big Savings through:**

- Increased productivity
- Reduced Scrap
- Improved Quality
- Improved Safety
- Typical payback measured in weeks

Employing the principle of active ionizing, equipment comprises power unit and numerous types of electrodes for ionizing the surrounding air. The most common component is the single and double row antistatic bar, used for fixed installations, but having a fairly limited active range.

Where an increased active range is required air can be passed across the nozzles of the bar. Other products in the range include - antistatic guns, ionizing fans and dust extraction units.

Servicing the diverse Manufacturing, Processing and Converting Industries from our facility in Denmead, Rimor are exclusive distributors of Swedish Electrostatics throughout the United Kingdom.

Our team of Sales Engineers are available for site visits, where they provide a comprehensive on site service to survey the requirements and recommend a suitable solution.



## Anti Static Bars

The most common component in any antistatic installation is without doubt the antistatic bar. When selecting these bars it is necessary to consider each individual application and the possible constraints that may apply. The efficiency of ionising equipment is dependant on the distance between the bar and the material surface to be discharged, as well as the surface speed of the material. Single bars can be used where distances are short and speeds moderate. As speeds and distances increase consideration can be given to the use of double row bars or blown air bars. Blown air bars are extremely effective in applications where unwanted particles such as dust, chips, fibres etc need to be removed. The air from the bars is used as a carrier for the charges whilst blowing the unwanted particles away from the material surface.



## Air Blown Nozzles

Ionising air-blowing nozzles are electrodes that provide a well-defined airflow, are compact and are easily installed. Separate high ohmic resistors connect each individual pin to the high voltage lead in the nozzle, providing high reliability and safe operation in harsh industrial environments. The nozzles are connected to a power unit in the PUAC series by an interchangeable shielded high voltage cable ensuring installation is safe, uncomplicated and flexible. A pistol handle for manual cleaning is available as are a variety of accessories such as foot or solenoid valves, regulators etc.



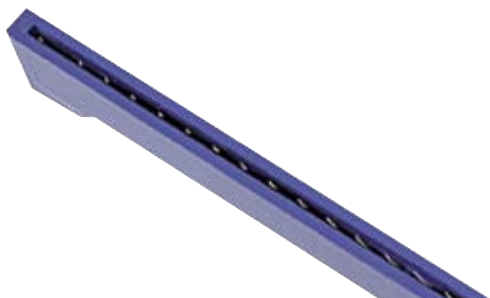
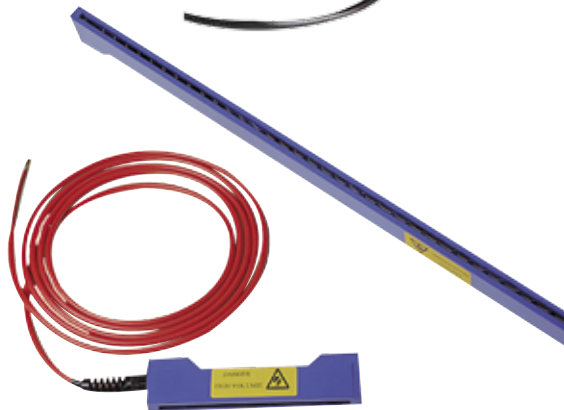
## Ionising Fans

Ionising fans provide an even longer range of ionised air than the antistatic bars or air blowing bars and nozzles. The airflow is less defined than the air blown equipment, however it does cover larger surface areas. These fans are available in 230V AC and 12V DC versions. The 230V version produces a larger airflow while the 12V DC version provides a less expensive and more compact solution. Both types of fan are built using a modular design available in lengths from 400 to 2800mm in increments of 400mm.



## Power Units

The PUAC power units are designed to operate using AC current and are used to run ionising equipment. Although these are a Swedish Electrostatic product they can be used in conjunction with other manufacturers ionising equipment rated up to 4.8kV. The standard PUAC114 unit is the most commonly used, however some applications require the ionised air to be blown, for this reason other power units in the range incorporate specially integrated features and are denoted IAC. The PUDC range of power supplies are available for applications using DC current, and is supplied as a complete ready to run unit with integrated ionising electrodes. All units are housed in die cast Aluminium enclosures rated to IP65.



## Static Generators

The range of high voltage generators have been developed to be used in conjunction with charging bars and point charging electrodes. This equipment is being used in industry for an ever-increasing number of applications where there is a requirement to electrostatically charge one or more materials in a controlled manner. The electrostatic charging of materials causes them to be attracted to one another preventing them from moving whilst they are undergoing a process.

A range of generators are available depending upon performance criteria, level of sophistication and power requirements. Units can be supplied with or without voltage indicating displays as well as ones delivering fixed and variable voltages. Generators are manufactured for one polarity dependant on the application, where both polarities are required then two generators need to be purchased.

## Electro Static for pinning, locating and holding

Swedish Electrostatics Static Generating systems employing the same design and construction technology as used in their Static Eliminator systems. Common uses include:

- Securing stacks of paper and film prior to wrapping or boxing
- Pinning items prior to subsequent processing e.g. fixing labels into injection moulds.
- Holding protective coverings in place prior to stacking or packing.

## Dust Extraction Units

Static electricity can cause many problems when trying to keep surfaces free from dust, or unwanted particles.

When a material surface needs to be cleaned, Swedish Electrostatic is able to offer a comprehensive range of dust extraction equipment utilising Ionised air to neutralise unwanted particles. Their dust extraction units combine the elimination of static electricity, with air blowing nozzles and vacuum units allowing unwanted particles to be easily removed from the material being processed. These units can be readily integrated into existing machinery that typically handles plastic film, foils, paper, boards, glass and many others. In order to achieve this integration these particle extraction units may need to be tailor made to fit the existing machinery, and it is in this area that Swedish Electrostatic together with Rimor is able to call on its years of experience in this field to assist clients in providing solutions.

## Do you have a static problem?

As Electrostatic influences are often difficult to see, feel and sometimes measure, it is commonly assumed they are either not present or are having no effect on production. However, often the reason production machinery does not perform to specified capacity or at stated speeds will be due to the detrimental influence of static electricity, causing;

- Missed feed, Tangles and jams
- Incorrect placing & spacing, skews and smears
- Blockages, erratic feed and overspill.
- Dust and particulate inclusion or covering

## What makes Swedish Electrostatics Systems uniquely superior?

- More Ion generation pins per metre means higher neutralizing Ion density.
- Hardened Stainless Steel Pins means superior corrosion resistance and durability.
- Physical connection of Pin to supply via resistor means superior use of available power and Ion generation
- Connection cable can be independently replaced in the event of breakage, without the need to replace the entire unit.
- For the Food processing sector – Bars & Nozzles are also available in Stainless Steel & meet with FDA requirements.

