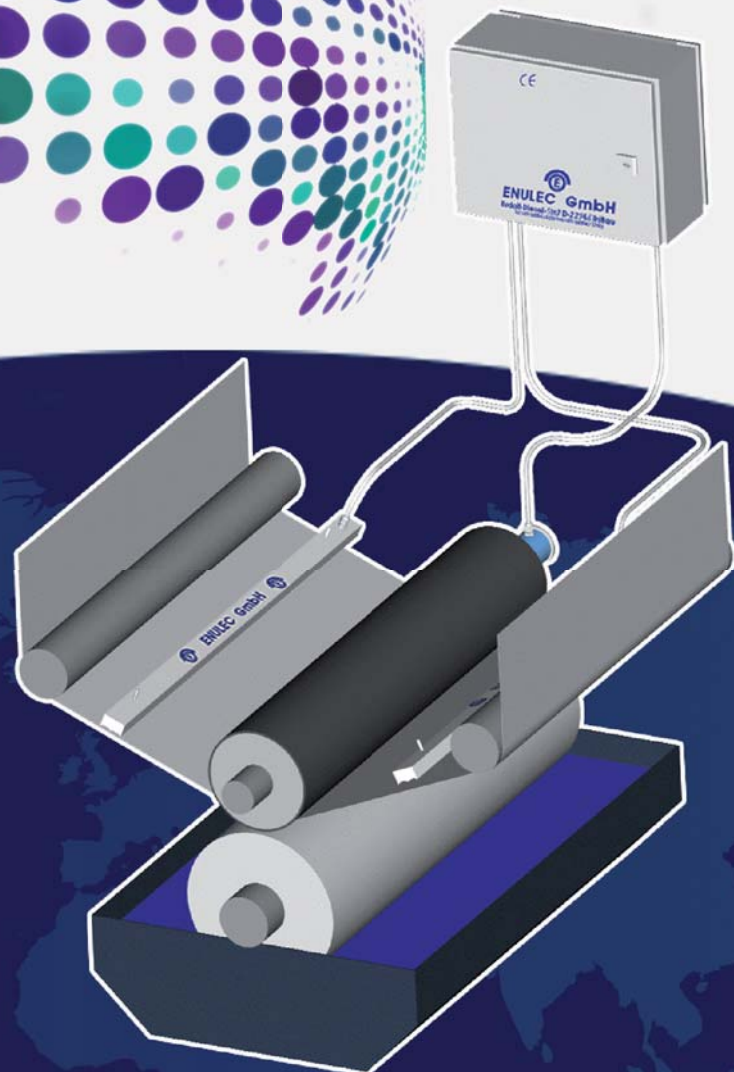




ENULEC® Static Elimination Systems



Talk To ENULEC® - the leading supplier of ElectroStatic Printing Assist Systems



ENULEC® Static Elimination System

ENULEC Static Elimination Systems Type ESA1000-L/C (Discharge only) were developed as part of the renowned ESA1000compact Electrostatic Printing Assist System, designed to eliminate the build up of static charge in the hazardous environment of a gravure printing and coating machine printing with solvent based inks.

The ENULEC discharging bar has at each high voltage pin a special »safety« resistor to ensure that no sparks can occur when the charge bar is contaminated. The systems are fully ATEX tested and approved for this application and non-ATEX certified versions are available for less demanding environmental applications.

Whilst electrostatic discharge systems are basically very similar, whoever the supplier, we should like to point out a number of features which are either unique to ENULEC or of which we are particularly proud:

The special discharge bar system is designed to meet highest safety requirements especially in a heavy contaminated environment. With this discharge bar manufactured from heat and shock resistant special glass-fibre reinforced material the pins are addressed to the substrate through a unique pin layout to ensure that the substrate is fully discharged. This feature enables more efficient discharge of the web and discharge at higher speeds. It was developed for applications where the web has a greater than normal tendency to retain charge, but it is of interest to all users who have particular static charge issues.



Due to this special design no sparks can occur even if the discharge bar is contaminated with non conductive ink. The discharge bar is not only safer because the build-up of conductive bridges between the needles can not longer occur; it also very significantly lengthens maintenance intervals for cleaning.

Be installed at a distance of approx. 10-60mm from the substrate the transfer of voltage from the output of the power supply ESA1000-L/C (discharge only) is particularly efficient. The power supply itself is designed by ENULEC and the result is a very robust power supply with an impressively low failure rate which can deliver an output voltage of 5kV, 115V AC /230V AC.

Technical Data:

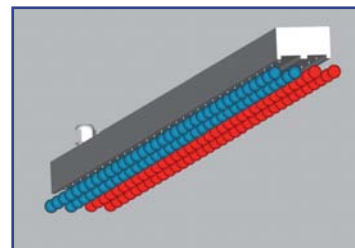
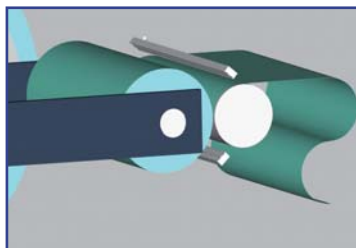
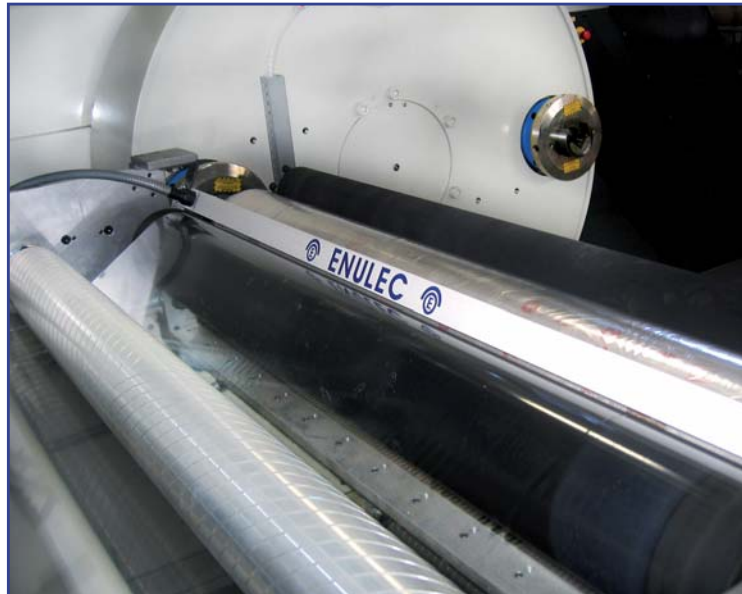
Capacity: 25 W	
Supply Voltage:	110V to 240V 50/60 Hz
Output Voltage:	+/- 6KV to +/- 12KV



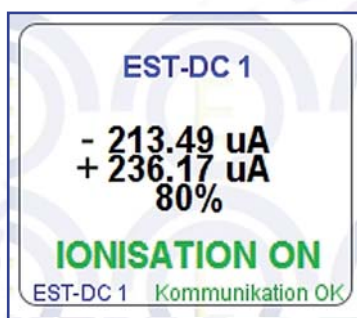
No more disruptive electrostatic charges

With the arrival of our tried and tested **high performance D C voltage static discharge technology**, problems related to double-layer and conventional charge are a thing of the past

Enulec's highly effective EST-DC static discharge system which has been successfully established in the market for 15 years removes unwelcome electrostatic charges from gravure printing / converting machines and also from roll slitting machines and laminating machines. Free ions (both positively and negatively charged) are fired at the travelling web of film at high speed during the winding process. During this process the positively charged ions on the web recombine with the strongly accelerated negatively charged ions coming from the DC discharge electrode. The EST-DC-LDS discharge system operates over a range of approximately 20–800 mm and does not need to be adjusted for webs having differing static charges. By virtue of its special direct current technology the system can successfully eliminate all combinations of electrostatic charges and there is no need to use additional alternating current discharge systems on the winder. The EST-DC-LDS provides optimum finished roll discharge for all static conditions including double-layer static and varying web polarity.



ENULEC® EST-DC-LDS integrated with the ENULEC® Bus System



When supplied for gravure printing machines fitted with an ENULEC ESA1000 electrostatic assist system (ENULEC Top-Loading or ENULEC Direct Charging), the EST-DC-LDS output is optimised to suit the number of ESA units activated. When connected to the RS422 ENULEC Bus System, the EST-DC-LDS output is reduced when only a few ESA units are activated so as to extend the life of the discharge bars. Additionally, the possibility exists to display the current levels of the EST-DC-LDS in the touch screen and to integrate them into the ENULEC quality management system. In this way, the polarity of the plastic film materials processed can be analysed and compared and evaluated over a period of years.

Enulec GmbH has grown to occupy a leading market position in the field of electrostatics. The company offers custom designed solutions to electrostatic related problems. The product range includes highly effective Electrostatic Printing Assist systems ESA (standard top loading, maintenance free top loading, core charging and side loading systems) which have helped customers in the gravure printing industry to achieve high quality print standards along with high productivity and maximum standards of safety. In addition to this, EST electrostatic discharging systems assist customers in the printing and plastics processing industries to successfully eliminate static charges in machines such as winders, slitters and laminating machines, so ensuring smooth and safe production processes. All products intended for use in the potentially explosive zone of the printing process comply with the very latest ATEX requirements.



The worldwide service department of ENULEC responds quickly to customers' requirements within 24 hours and provides a tailor-made solution to each and every customer need.



ENULEC Energieübertragungselectronic GmbH
Rudolf-Diesel-Str. 7
D-22946 Trittau
Phone +49 (0) 4154 - 42 29 • Fax +49 (0) 4154 - 37 80
info@enulec.co
www.enulec.com