

HAUG Ionization - for the application of electrostatic charges



HAUG charging systems

HAUG charging systems are intended for the contact-free application of electrostatic charges. These systems are used wherever different materials need to be fixed to one another electrostatically. At least one of these materials must be insulating. This electrostatic fixation is intended to support downstream processes such as the film overlap in packaging machines.

All HAUG charging generators are available with positive and negative polarity.

Applications

HAUG charging systems can be used, among others, in the following applications:

- for fixing and positioning films and foils, paper and cardboard, e.g. on steel sheets, glass panels, wood panels or similar;
- for fixing films and foils on packaging machines/film welding machines;
- for fixing films and foils on turret film winders, for fixing the wound film against telescoping and glue-less commencement of the film winding process on cardboard tubes.

Charging generator AG SL

The output of this low-priced generator is set by modifying the distance of the electrodes. The **AG SL** has one high-voltage connection (DC). The output voltage is displayed by means of an analog measuring instrument.



Charging generator AG 25

This unit has been tested and proven thousands of times. It is suitable for all common applications. The generator **AG 25** is equipped with one high-voltage connection (DC). The electronic voltage adjustment is stepless, and there is a choice of analog or digital display integrated into the unit for the output voltage.



Charging generator AG 35

Beside its two high-voltage connections for the charging section, this unit also offers a discharge section with four high-voltage connections and electronic fault and performance monitor. The electronic voltage adjustment is stepless, and there is an analog voltage output display integrated into the unit.



Charging generator AG 30

This charging generator produces an adjustable high voltage of up to 40 kV_{DC}. The voltage and the current present at the relevant time are indicated at the integrated measuring instruments. Two separate potentiometers allow the high voltage and the current threshold to be set. If the current exceeds the set limit value, an error message is triggered and the high voltage is switched off. The charging generator **AG 30** can be pulsed externally. The integrated signaling socket can be used to control a signaling device. The **AG 30** is available optionally with analog or digital display.



Charging generator AG 60

This generator includes the charging section of an AG 30 and a discharging section with an electronic fault and performance monitor for the discharge unit. The **AG 60** can be pulsed externally.



HAUG GmbH & Co. KG

Germany

Friedrich-List-Str. 18
D-70771 Leinf.-Echterdingen
Phone: +49 711 / 94 98-0
Telefax: +49 711 / 94 98-298

www.haug.de
E-mail: info@haug.de

HAUG Biel AG

Switzerland

Johann-Renfer-Str. 60
CH-2500 Biel-Bienne 6
Phone: +41 32 / 344 96 96
Telefax: +41 32 / 344 96 97

www.haug-ionisation.com
E-mail: info@haug-biel.ch



Technical data AG SL / AG 25

Dimensions (L x W x H):	269 x 168 x 150 mm
Type of protection:	IP 54
Protection class:	I
Supply voltage:	115 V _~ / 230 V _~ (50–60 Hz)
Power input:	approx. 50 VA
Nominal output voltage Charging:	approx. 25 kV _{DC}
Short-circuit output current Charging:	$I_k \leq 1,1 \text{ mA}$
HV-terminals charging:	1
Operating temperature:	+5 °C to +45 °C
Storage/transport temperature:	-15 °C to +60 °C
Weight:	7 kg
Mains cable:	2.6 m, fixed to the device Subject to technical changes!

Technical data AG 60

Dimensions (L x W x H):	390 x 280 x 210 mm
Type of protection:	IP 54
Protection class:	I
Supply voltage:	115 V _~ / 230 V _~ ; 50–60 Hz
Power input:	approx. 140 VA
Nominal output voltage Charging:	approx. 40 kV _{DC}
Discharging:	approx. 7–8 kV _{AC}
Short-circuit output current Charging:	$I_k \leq 4,5 \text{ mA}$
Discharging:	$I_k \leq 5 \text{ mA}$
Load rating of signaling contacts:	24 V _{AC} / 35 V _{DC} ; max. 50 mA
Pulse frequency via pulse input:	max. 1 Hz (max. 10 ⁶ cycles)
HV-terminals charging:	2
HV-terminals discharging:	4
Connectable lengths (Discharging)	max. 18 m (ionizing unit incl. HV-cable)
Operating temperature:	+5 °C to +45 °C
Storage/transport temperature:	-15 °C to +60 °C
Weight:	16 kg
Mains cable:	2.6 m, fixed to the device Subject to technical changes!

Accessories

Signalling cable K1, shielded 5 m, incl. round plug	Order-No.: 06.8941.000
10 m, incl. round plug	Order-No.: 06.8941.001
20 m, incl. round plug	Order-No.: 06.8941.002
Round plug	Order-No.: X-0616
Angled plug	Order-No.: X-5718

**Technical data AG 30**

Dimensions (L x W x H):	390 x 280 x 210 mm
Type of protection:	IP 54
Protection class:	I
Supply voltage:	115 V _~ / 230 V _~ (50–60 Hz)
Power input:	approx. 60 VA
Nominal output voltage Charging:	approx. 40 kV _{DC}
Short-circuit output current Charging:	$I_k \leq 4,5 \text{ mA}$
Load rating of signaling contacts:	24 V _{AC} / 35 V _{DC} ; max. 50 mA
Pulse frequency via pulse input:	max. 1 Hz (max. 10 ⁶ cycles)
HV-terminals charging:	2
Operating temperature:	+5 °C to +45 °C
Storage/transport temperature:	-15 °C to +60 °C
Weight:	3.5 kg
Mains cable:	2.6 m, fixed to the device Subject to technical changes!

Accessories

Signalling cable K1, shielded 5 m, incl. round plug	Order-No.: 06.8941.000
10 m, incl. round plug	Order-No.: 06.8941.001
20 m, incl. round plug	Order-No.: 06.8941.002
Round plug	Order-No.: X-0616
Angled plug	Order-No.: X-5718

Technical data AG 35

Dimensions (L x W x H):	390 x 280 x 210 mm
Type of protection:	IP 54
Protection class:	I
Supply voltage:	115 V _~ / 230 V _~ (50–60 Hz)
Power input:	approx. 100 VA
Nominal output voltage Charging:	approx. 40 kV _{DC}
Discharging:	approx. 7–8 kV _{AC}
Short-circuit output current Charging:	$I_k \leq 0,8 \text{ mA}$
Discharging:	$I_k \leq 5 \text{ mA}$
HV-terminals charging:	2
HV-terminals discharging:	4
Connectable lengths (Discharging)	max. 18 m (ionizing unit incl. HV-cable)
Operating temperature:	+5 °C to +45 °C
Storage/transport temperature:	-15 °C to +60 °C
Weight:	14 kg
Mains cable:	2.6 m, fixed to unit Subject to technical changes!

Accessories

Signalling cable K1, shielded 5 m, incl. round plug	Order-No.: 06.8941.000
10 m, incl. round plug	Order-No.: 06.8941.001
20 m, incl. round plug	Order-No.: 06.8941.002
Round plug	Order-No.: X-0616
Angled plug	Order-No.: X-5718

