SCHIEDERWERK

Electronic Lamp Power Supply

PVG 5-30
PVG 5-40

Technical Specifications

CHARACTERISTICS

- With POWER FACTOR CORRECTOR (PF >0,95) in compliance with DIN EN 61 000 - 3 – 2, Class C
- µP control for various parameter
- Flickerfree operation
- Longer lamp service time
- Constant light output during lamp service time
- by power regulation
- Higher light intensity than conventional ballasts
- Compact shape, low weight
- Mains input 100 – 240V
- Additional output for 400V/240W
- power supply without PFC
- Dim function
- Lamp On / Off via opto coupler

ORDER NUMBERS

Type	Order No.	Output / W	Lamps
PVG 5-30	32 454 1000	300	BA, BS, HMI, HMP, HTI, MSI, MSR, UMI
PVG 5-40	32 554 1000	400	

LIMITS

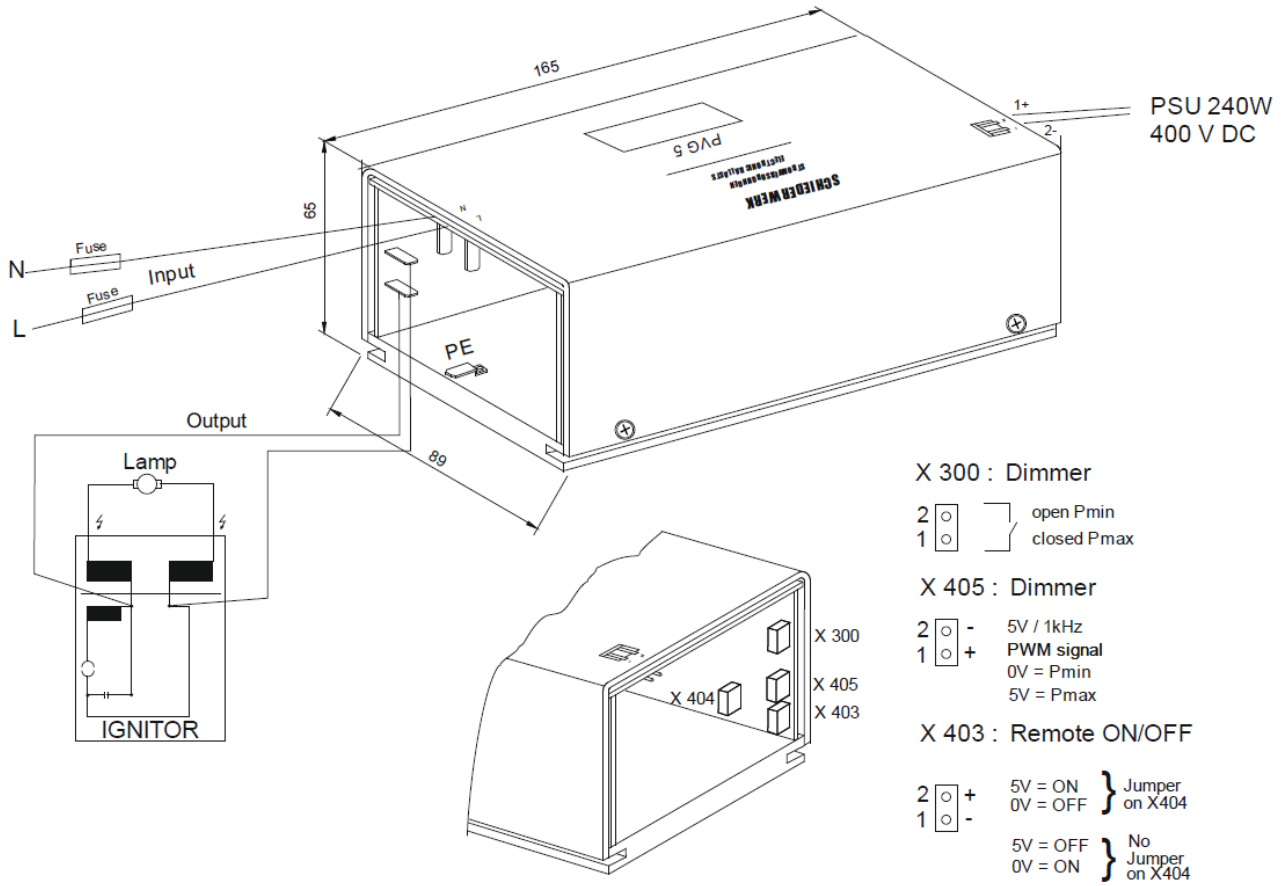
Generally all discharge lamps can be supplied within following limits:

IL_{max} = 5A UL_{max} = 135V P_{max} = 400W

TECHNICAL DATA

Mains voltage function range	100 – 240V AC
Line frequency	47 – 63Hz
Power factor	>0.95 at 230V, >0.97 at115V
Earth leakage current 230V, 50-60Hz	< 0,7mA
Lamp voltage range	70 – 135V
Dimming range	50-100%, dependent on lamp type
Efficiency	0,9 at 230V / 0,85 at 115V typ.
Ambient temperature	max. 50°C, forced cooling necessary
Output power tolerance	± 5%
Protection	Thermal cut off at 80°C heat sink temperature, restart at 50°C Short circuit protected Open circuit protection
EMI	By external noise filter
Maximum dimensions	LWH 165 x 89 x 65 (external heat sink required)
Weight	1.1kg
Approvals	for PVG 5-30: ETL according UL 1029, UL 935 and CAN/CSA-C22.2 No. 74 part 2 standards for PVG 5-40: approval under process

Subject to changes without notice



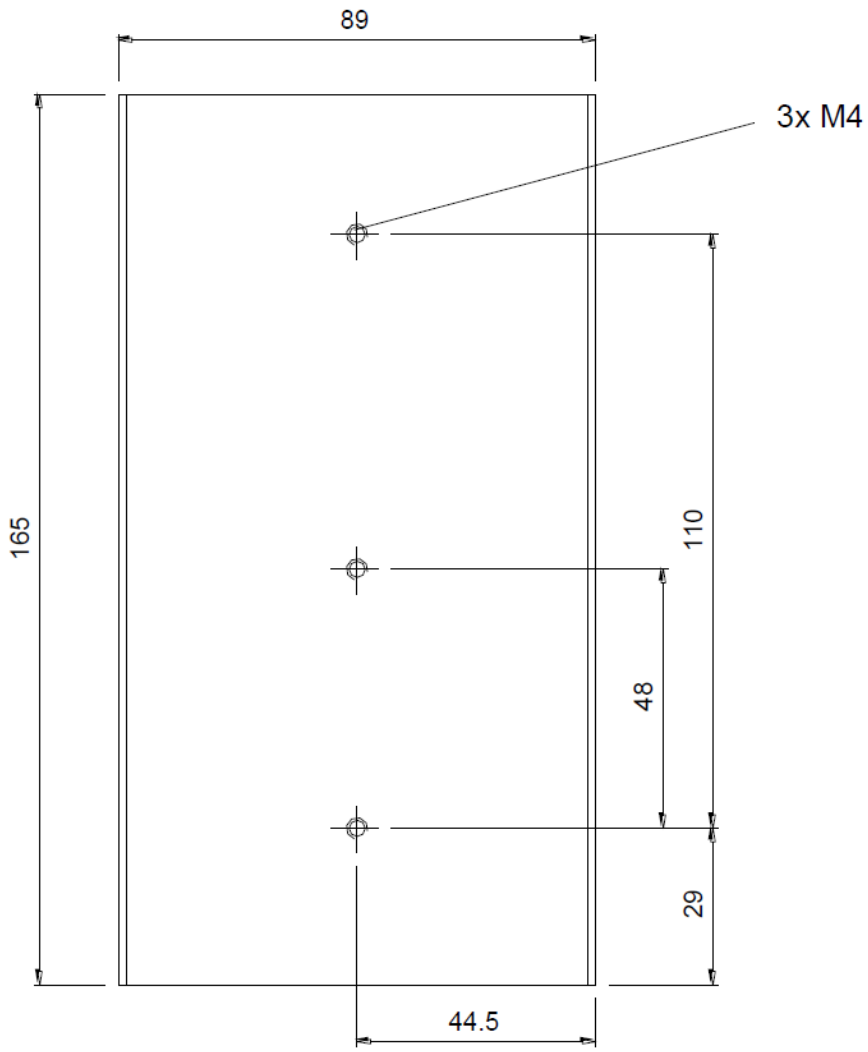
Connectors

Lamp ON/OFF	JST B2B-EH-A
Mains input	AMP Faston 2,8 x 0,8
To ignitor	AMP Faston 2,8 x 0,8
Dimmer	JST B2B-EH-A
Aux voltage	JST B2P3S-VH
Lamp ON/OFF	JST B2B-EH-A

Accessories

Ignitors	KZG 8-4, Order no. 32 458 1010 for cold start
EMI filter	Dependent on wiring, current rating min 8A, Schiederwerk filter order no. 32 313 1000 recommended.

Mounting details, bottom view



Dimensions in mm

WARNING NOTICE

Do not attempt to handle or operate an electronic power supply (EPS) and ignitor before completely reading and understanding this notice. Contact Schiederwerk if you are uncertain of hazards associated with these devices.

The ignitor produces starting voltages of up to 60 kV and electromagnetic radiation interference which are hazardous to personnel and sensitive instrumentation. Exercise appropriate care in the handling of high voltages. Do not touch any conductive parts during operation.

Ensure the units are disconnected from the mains before exchanging the lamp connected to the PSU / ignitor resp. to the end application. The residual charge left on the capacitors is a danger to life if the units are still connected to mains!

Caution: The residual charge on the capacitors can be a danger to life even if the units are disconnected from the mains. Please handle with care!

Both electronic lamp ballast and ignitor must never be installed or operated in an explosive or volatile atmosphere. Never use the ballast or ignitor near flammable gases or liquids. See that there will be no moisture, dust or similar which could lead to short circuits or fire.

Before using the ballast or ignitor in any kind of outdoor application you have to take additional measures and observe special requirements. If you are uncertain, contact Schiederwerk.

No potential isolation is provided between line input and output. Accidentally grounding of an output terminal by direct contact or arcing to GND can damage the unit (no warranty replacement).

The unit is designed for case mounting. Due observation of electrical safety and RFI suppression code requirements is mandatory in all applications. See that sufficient cooling of EPS and ignitor is provided.

All installation and repair work on this unit is only permitted by qualified personnel. Always comply with local safety requirements when operating the unit uncased.

Extreme care must be taken when testing the unit live. The use of an isolating transformer is mandatory. On no account may grounded test instruments / meters be used for this purpose!

Schiederwerk does not assume liability for disregarding of this notice, incorrect use of the EPS and ignitor or dis-regarding of any legal requirements. This product is subject to technical changes without prior notice.

CAUTION:

Mains supply must be fused according to local safety regulations.
Schiederwerk recommends 2 pole fuse (L+N). The appropriate fuse value can be calculated as:

$$1{,}5 * \frac{P_{lamp}}{V_{line}} \geqslant I_{fuse} \geqslant 1{,}2 * \frac{P_{lamp}}{V_{line}}$$

Last Update: 13.02.2014