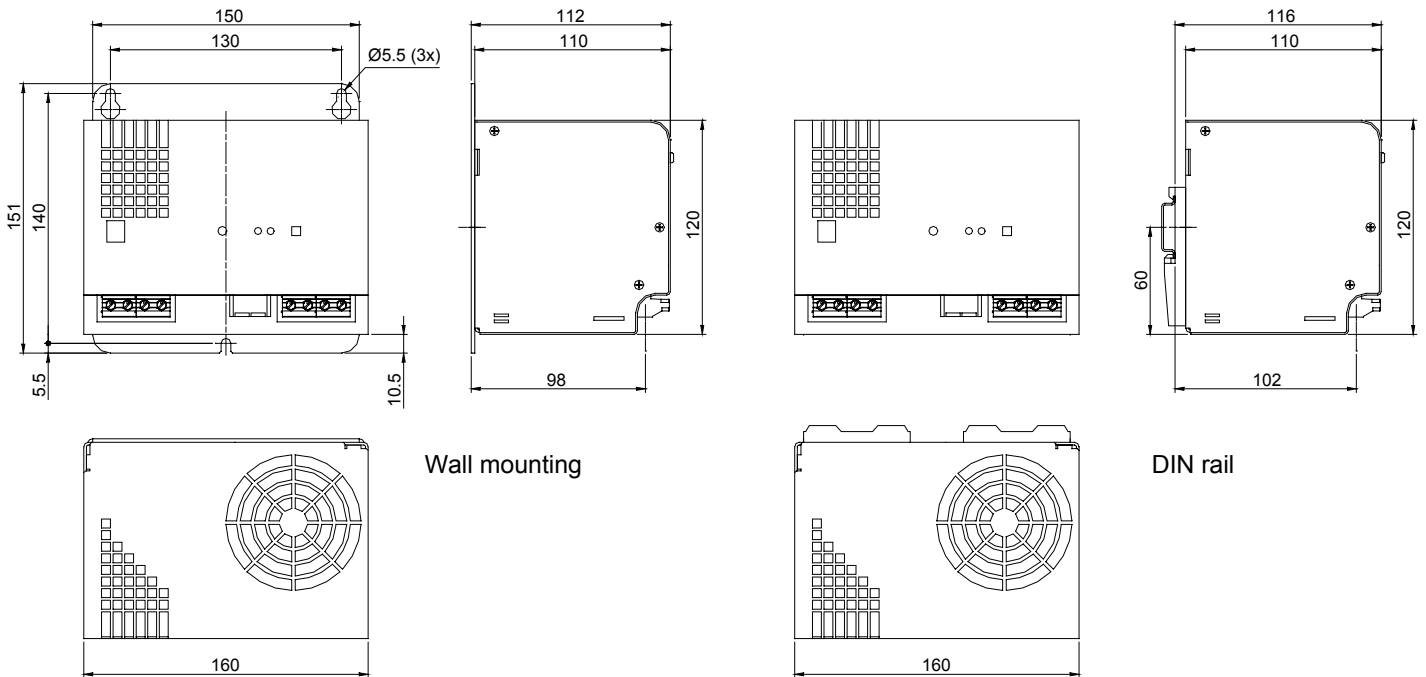


**AC-DC POWER SUPPLY
PRIMARY SWITCHED MODE
SINGLE OUTPUT
PH 520 SERIES**



- Input: 120 / 230 VAC switchable (DC 263 – 350V)
- Internal fuse
- Overtemperature protection
- Output adjustable *
- Parallel connection with load sharing *
- Power boost with high start-up current 140% Inenn *
- Control signals *
- Can be operated in any assembly position

* additional features, not included in PH 520-2420A model



Wall mounting

DIN rail

ORDER DATA			Order numbers in italics	
Vo V	Io A	Preset range Vo V	Type No. DIN-rail	Type No. Wall mounting
24	0 - 20	-	PH520-2420A <i>14.6040.120</i>	PH520-2420A <i>14.6040.125</i>
24	0 - 20	22,5 – 31,5 *	PH520-2420 <i>14.6040.100</i>	PH520-2420 <i>14.6040.105</i>
48	0 - 10	42,5 – 54	PH520-4810 <i>14.6040.300</i>	PH520-4810 <i>14.6040.305</i>


* max. output 540 watts

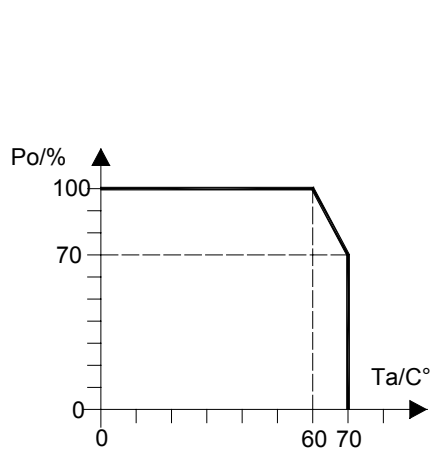
Further output voltages upon request.

Redundancy version (PH520-...R) upon request.

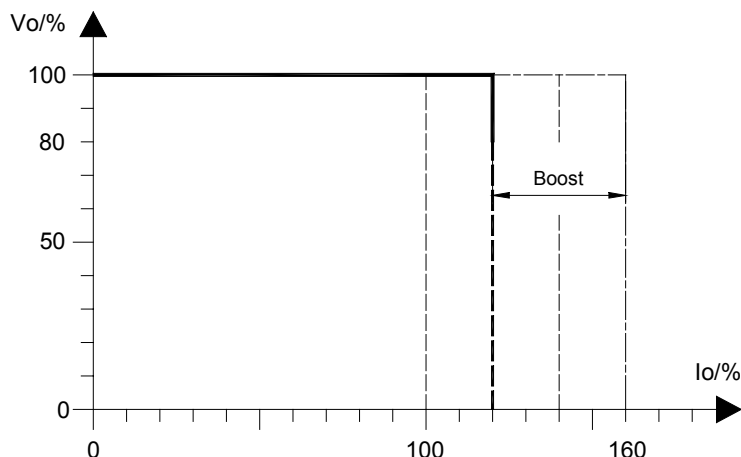
Please ensure a distance of approx. 30mm between both the air-inlet openings at the front of the housing and the air-outlet openings at the top of the device and surrounding components or surfaces.

Also make sure that outgoing air is not sucked back into the device during installation.

<p>INPUT</p> <p>Input voltage range AC 187 – 264V, 50/60 Hz mechanical switchover to AC 90-134V DC 263 – 350V (on 230V) requiring external DC fuse</p> <p>Efficiency 89%</p> <p>Input current limitation** ≤ 35 A_{peak} typ. in cold state ≤ 70 A_{peak} typ. in hot state</p> <p>Internal fuse 16ATH / 250V</p> <p>OUTPUT</p> <p>Preset range Vo * 22.5 – 31.5V / 42.5 – 54V</p> <p>Tolerance of Vo_{nominal} +- 0,1V (PH520-2420A 24V -0% / +4%)</p> <p>Max. output 540W</p> <p>Operation indicator ** Green LED for Vo, red LED for error</p> <p>Ripple 80 mV_{ss} typ.</p> <p>Noise voltage 120 mV_{ss} typ.</p> <p>Temperature coefficient 0.025% / K</p> <p>Switch on/switch off No Vo overshoot (soft-start)</p> <p>Start-up delay < 1 s</p> <p>Rise time 15 ms typ., 350 ms at 100.000 µF load</p> <p>PROTECTION AND CONTROLLING</p> <p>Overvoltage protection 33/58 V automatic repeat</p> <p>Current limitation 105 – 120% I_{nominal}, output permanent short-circuit proof, boost time 1.5 s 140%I_{nominal} **</p> <p>Overtemperature protection Switches off if overheated, reconnection with hysteresis</p> <p>Mains buffering 10 ms typ.</p> <p>Power-Good-Signal* Relais contact (<60V/0.2A), changing at Vo 18-20V / 35-40V from OK to FAIL</p> <p>Remote on/off * External switch-off with >3-24V / 4-60V or switch from Vo</p> <p>SAFETY</p> <p style="text-align: center;">EN 60950 / VDE 0805 / VDE 113 Safety Class I, VDE 0100, IP 20 Sparking distance in air and leakage distance according to VDE 0160/pr / EN 50178 UL 508 listed / UL 1950 / CSA 22.2-950</p> <p>* Additional features, not included in PH520-2420A model ** Values are different for PH520-2420A</p>	<p>EMC</p> <p>Mains feedback (PFC) EN 61000-3-2 Class A</p> <p>Flicker EN 61000-3-3</p> <p>Interference suppression/ Interference immunity EN 61000-6-2 Intensity 4 EN 61000-4-2 Noise level 10V/m EN 61000-4-3 Intensity 4 EN 61000-4-4 Intensity 4 EN 61000-4-5 Intensity 4 EN 61000-4-6 Noise level 10V/m EN61000-4-11 ENV 50204 Noise level 10V/m</p> <p>Interference emission EN 50081-1 EN 55011 / EN 55022 Class B Radiation depends on assembly</p> <p>OPERATING DATA</p> <p>Temperature range -25°C to 70°C, integral temperature- controlled fan, air intake at front</p> <p>Derating 3% / K at +60°C (see diagram)</p> <p>Weight 1.6 kg</p> <p>MECHANICS</p> <p>Connection Mains input: 3-pole, 0.6 - 0.7 Nm 0.75-4/6 mm² strand/wire Load output: 4-pole, 0.6 - 0.7 Nm 0.75-4/6 mm² strand/wire Control signals**: 4-pole, 0.79 Nm 0.15 – 2.5 mm (with plug connector)</p> <p>Assembly All systems can be snapped onto a sym- metrical 35mm DIN-rail according to EN 50022 with a diameter of 1 to 2.5 mm or wall-mounted with mounting plates.</p> <p>EXPLANATORY NOTES</p> <p>PE ⚡ Protective conductor Do not use supply without PE-connection!</p> <p>+/- Load connections</p> <p>Relais/OK/Fail * Monitoring connections</p> <p>Remote on/off* Control connections</p> <p>Switching from single * to parallel operation mode Use switch at the front of housing</p> <p style="text-align: center;"> Please refer to the MGV user instructions before use. (also in internet: www.mgv.de)</p>
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Derating



Current limiting characteristic

Start-up takes place with short-circuit current between 140% and 160% of the nominal current for a period of approx. 0.4 s. Start-up frequency is approx. 0.3 Hz. The average short-circuit current is about 125% I_{nominal}