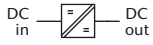


Features

- DC input: 320 - 800 V
- AC input: 3-phase, 47 - 63 Hz
- DC output: 48 / ... / 800 V
- Continuous short circuit protection
- Overvoltage protection
- Thermal shutdown with auto restart
- Industrial grade components
- High efficiency through ZVS topology
- High power density
- Compact and robust design



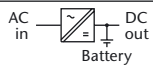
DC / DC Converters

▶ 22 KW				
Input VDC			Output VDC	
320–640 ¹⁾ VDC	450–800 VDC	Output Amps	Adj.	Range
C 6479 G	C 6479 K	360	48	45– 55
C 6476 G	C 6476 K	320	60	58– 68
C 6477 G	C 6477 K	170	110	100– 130
C 6477 GJ	C 6477 KJ	110	200	190–200
C 6478 G	C 6478 K	88	220	200–250
C 6478 GJ	C 6478 KJ	55	400	380–400
C 6477 GH	C 6477 KH	36	tba ²⁾	570–600
C 6478 GH	C 6478 KH	27	tba ²⁾	760–800



AC / DC Converters

▶ 22 KW				
Input VAC, 3-Phase		Output Amps	Output VDC	
3x400 ^{+15%} _{-20%}	3x480 ^{+10%} _{-15%}		Adj.	Range
C 6489 V	C 6499 V	360	48	45– 55
C 6486 V	C 6496 V	320	60	58– 68
C 6487 V	C 6497 V	170	110	100– 130
C 6487 VJ	C 6497 VJ	110	200	190–200
C 6488 V	C 6498 V	88	220	200–250
C 6488 VJ	C 6498 VJ	55	400	380–400
C 6487 VH	C 6497 VH	36	tba ²⁾	570–600
C 6488 VH	C 6498 VH	27	tba ²⁾	760–800



Battery Chargers

▶ 22 KW				
Input VAC, 3-Phase		Output Amps	Output VDC	
3x400 ^{+15%} _{-20%}	3x480 ^{+10%} _{-15%}		Nom. Battery Voltage	Range
B 6484 V	B 6494 V	310	48	48– 64
B 6486 V	B 6496 V	270	60	60– 80
B 6487 V	B 6497 V	150	110	110–145
B 6488 V	B 6498 V	75	220	220–290

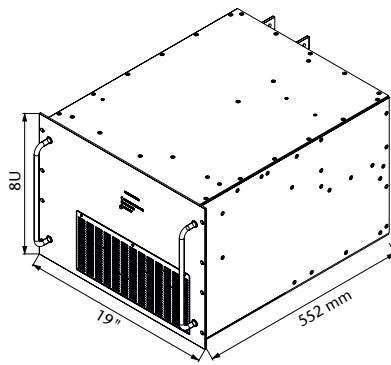
Assistance in table use:

- 1 Select the column for input voltage range.
- 2 Select the row for the appropriate output voltage.
- 3 The intersection of both results in the module required.

For example:

- 1 input voltage = 3 x 480 VAC
- 2 output voltage = 48 VDC @ 360 A
- 3 results in a C 6499 V module.

¹⁾ for input voltage < 400 VDC the output power needs to be reduced by 20%
²⁾ tba = to be advised



19" Plug-in module / approx. 90.0 kg

Specifications

Input

Voltage range narrowing of input voltage range optimizes the efficiency (pls. specify), unit switches off at under- and overvoltage

No-load input power. 30 W typical

Switch-on time 1 s typical

Immunity

- ESD. acc. to DIN / EN 61000-4-2 level 3

- Fast transients acc. to DIN / EN 61000-4-4 level 3

- Surges acc. to DIN / EN 61000-4-5 level 3

Output

Line regulation ($\pm 10\%$) 0.1 %

Load regulation (10-90 %) 0.2 %

Load transient (10-90-10 %) 6 % typical

Response time to $\pm 1\%$ 10 ms typical

Turn-on rise time Soft-start, 300 ms typical

Ripple. 0.5 % rms

Overload protection current limited to 105 - 110 % of I_{nom}

Overvoltage protection. OVP switches off module with automatic return to operation, after 5 seconds, the unit will remain latched off

Remote sense. standard for C series up to 150 V output, compensation up to 6 V

General

Efficiency 90 - 95 %

Operating temperature. -20 to $+50$ °C

Storage temperature -40 to $+85$ °C

Humidity up to 95 % RH, non-condensing

Cooling with fans

Temperature coefficient 0.02 % / °C typical

Safety / Construction. acc. to DIN / EN 60950-1: 2003

Protection category. IP 20, others or NEMA upon request

EMI. acc. to EN 55022, class A, optionally class B

MTBF approx. 70,000 h @ 40 °C
acc. to MIL - HDBK - 217 E (notice 1)

Connector terminals / bolts / bars

Marking CE

Options

Input

- Inrush current limiting
- Reverse polarity protection for DC input

Output

- Parallel operation
- Redundant operation
- Inhibit (remote on / off)
- Reducing of current limiting at high ambient temperature

Signals

via open collector or relay contacts

- Power ok (input)
- DC ok (output)
- Sys-reset

Programming

- Output voltage or current via
 - potentiometer
 - analog signal
 - interface RS232 or IEEE488

Battery charger

- Temperature compensated charging voltage
- Automatic / manual selection of charging characteristic

Monitoring

- Input / output voltage or current via
 - analog signal
 - interface RS232 or IEEE488

Mechanics / environment:

- Digital V- and A-meter (see photo)
- Cooling via temperature controlled fans
- Tropical protection
- Extended temperature range to -40 °C