

Connection in Series

If the outputs of one or more units are connected in series each individual output should be protected by a low power shottky diode, e.g. NIHON EC21QS04, to avoid reverse polarity at any output.

Reverse voltages may happen at the switch-on cycle of the converter(s), if the output voltages do not rise at the same time. Via the load, the „faster“ output(s) could supply the „slower“ output(s) with a reverse voltage and destroy that or even the whole converter.

The maximum output current is limited by the lowest current limitation.

Connection in series is not recommended for the Families CPE3, NPE4, CPE6 and IPE6.

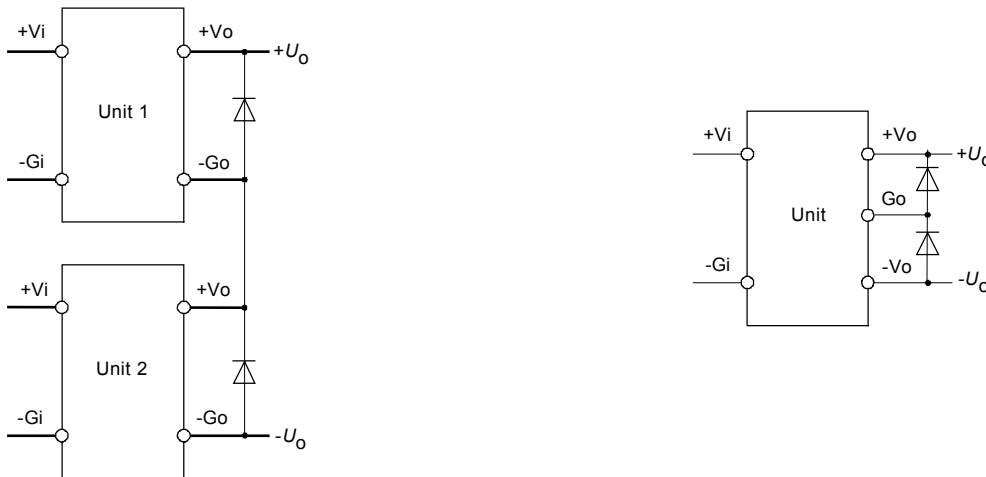


Figure 1: External protection for the outputs of two units connected in series.

Figure 2: External protection for two outputs of the same unit connected in series.

Connection in Parallel

The connection of the outputs of one ore more units in parallel is not permitted. Except the outputs of the Family IPL7.

Shutdown Description

For some product families there is a shutdown facility available. It offers to switch the output voltage(s) of the converter on and off via a control signal by using a transistor open collector drive.

The output voltage(s) is (are) switched on when the shutdown terminal is open circuit and switched off (shutdown) when a low voltage value ¹ is applied to the shutdown terminal. Note that the function of the Family IPL7 is inverse.

At an open shutdown pin max. 12 VDC appears.

¹ Value is depending on product family and specified for each individual product family.

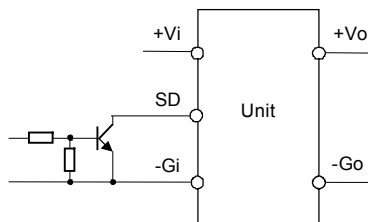


Figure 3: External shutdown control circuitry

Cleaning

Any submersion of the units in water or cleaning solvent is not permitted with the exception of the Families IXR1, IYR1, IZR1, IPX3, INX4, IPD6, IPR10 and ISR5.

Liquid Flux

For wave-soldering the following liquid flux is recommended: EO-Flux „GSP-2533/RX“, (acc. to DIN-EN 29454: 1.2.3.A)