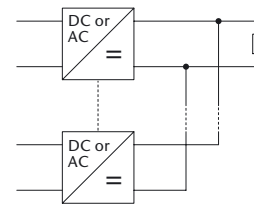


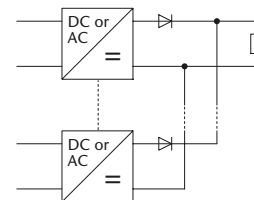
▶ Parallel operation

Single output modules of the same voltage / power rating can operate in parallel under specific conditions. The output voltage can be carefully adjusted to be near identical. When there is sufficient loading on the combined output, all units will be active and supply the load. The load demand must be significant enough for the multiple units to deliver output current.



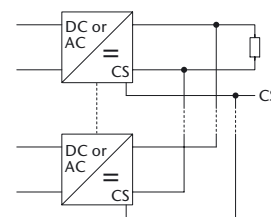
▶ Redundant operation

The inclusion of the option “dd” (decoupling diode) on the output of the units will permit parallel operation, where the inability to provide output from one unit will not have a negative effect on the load provision. The decoupling diode will also result in a load regulation value, which, as a percentage of the output voltage, will be unit / output dependent. In terms of calibration the same criteria follow as for parallel operation.



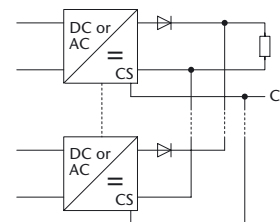
▶ Balanced current operation

The inclusion of the option “cs” (current sharing) allows for parallel operation with a significant degree of current balancing. The communication between the units allows for a voltage setting correction, which in turn shall equate to an automatic current sharing (balancing) on the outputs. The tolerance of such balancing is module dependent. In terms of calibration the same criteria follow as for parallel operation.



▶ Redundant balanced operation

The inclusion of both, the “cs” and “dd” option results in an optimized balanced current provision while being de-coupled from each other. A connected module, who is not supplying an output voltage, will influence the load voltage. The voltage may be reduced by up to 7%. In terms of calibration the same criteria follow as for parallel operation.



▶ Fault tolerant operation

The inclusion of “csi” (current sharing interrupt), “cs” and “dd” is the optimum set up for a fault tolerant application. “csi” will effect the removal of the “cs” signal from the load voltage common connection. Should there be an instance where a unit is not supplying the load, then the effect of its current sharing signal is removed, and the load voltage is unaffected by this condition. In terms of calibration the same criteria follow as for parallel operation.

