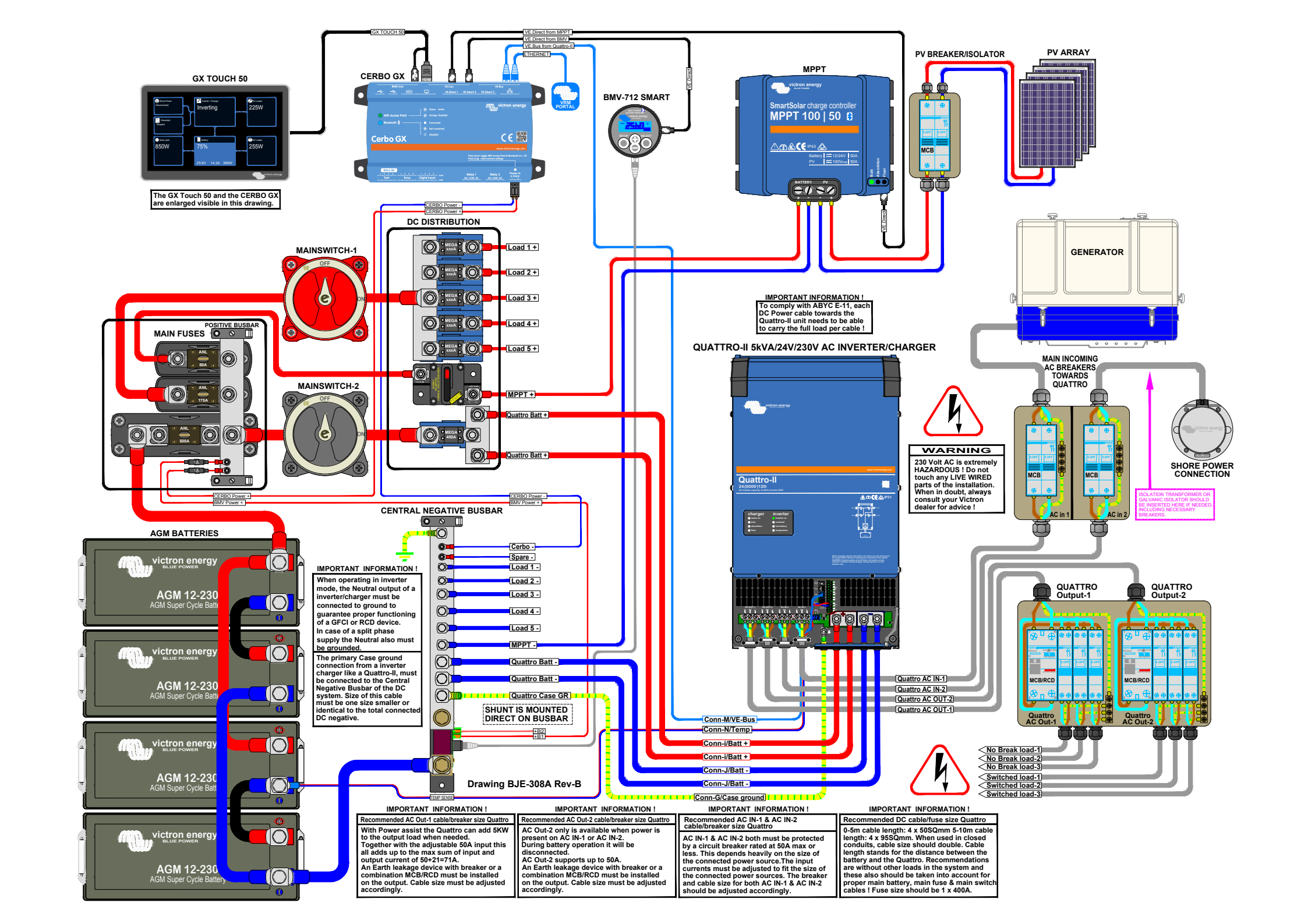
GX TOUCH 50
The GX Touch 50 and the CERBO GX are enlarged visible in this drawing.
CERBO GX
GX TOUCH 50
VE.Direct from MPPT
VE.Direct from BMV
VE.Bus from Quattro-II
ETHERNET
VRM PORTAL
BMV-712 SMART
MPPT
SmartSolar charge controller MPPT 100 | 50
PV BREAKER/ISOLATOR
MCB
PV ARRAY
GENERATOR
DC DISTRIBUTION
CERBO Power -
CERBO Power +
MAINSWITCH-1
MAINSWITCH-2
OFF
MAIN FUSES
POSITIVE BUSBAR
ANL 80A
ANL 175A
ANL 500A
Load 1 +
Load 2 +
Load 3 +
Load 4 +
Load 5 +
MPPT +
Quattro Batt +
Quattro Batt +
BMV Power +
IMPORTANT INFORMATION !
To comply with ABYC E-11, each DC Power cable towards the Quattro-II unit needs to be able to carry the full load per cable !
QUATTRO-II 5kVA/24V/230V AC INVERTER/CHARGER
Quattro-II
24|5000|120
charger
inverter
WARNING
230 Volt AC is extremely HAZARDOUS ! Do not touch any LIVE WIRED parts of the installation. When in doubt, always consult your Victron dealer for advice !
MAIN INCOMING AC BREAKERS TOWARDS QUATTRO
AC in 1
AC in 2
SHORE POWER CONNECTION
ISOLATION TRANSFORMER OR GALVANIC ISOLATOR SHOULD BE INSERTED HERE IF NEEDED, INCLUDING NECESSARY BREAKERS.
AGM BATTERIES
victron energy
BLUE POWER
AGM 12-230
AGM Super Cycle Batte
AGM Super Cycle Battery
CENTRAL NEGATIVE BUSBAR
Cerbo -
Spare -
Load 1 -
Load 2 -
Load 3 -
Load 4 -
Load 5 -
MPPT -
Quattro Batt -
Quattro Batt -
Quattro Case GR
SHUNT IS MOUNTED DIRECT ON BUSBAR
+B2
+B1
TEMP SENSE
IMPORTANT INFORMATION !
When operating in inverter mode, the Neutral output of a inverter/charger must be connected to ground to guarantee proper functioning of a GFCI or RCD device.
In case of a split phase supply the Neutral also must be grounded.
The primary Case ground connection from a inverter charger like a Quattro-II, must be connected to the Central Negative Busbar of the DC system. Size of this cable must be one size smaller or identical to the total connected DC negative.
Conn-M/VE-Bus
Conn-N/Temp
Conn-I/Batt +
Conn-I/Batt +
Conn-J/Batt -
Conn-J/Batt -
Conn-G/Case ground
Quattro AC IN-1
Quattro AC IN-2
Quattro AC OUT-2
Quattro AC OUT-1
QUATTRO Output-1
QUATTRO Output-2
MCB/RCD
Quattro AC Out-1
Quattro AC Out-2
No Break load-1
No Break load-2
No Break load-3
Switched load-1
Switched load-2
Switched load-3
Drawing BJE-308A Rev-B
IMPORTANT INFORMATION !
Recommended AC Out-1 cable/breaker size Quattro
With Power assist the Quattro can add 5KW to the output load when needed.
Together with the adjustable 50A input this all adds up to the max sum of input and output current of 50+21=71A.
An Earth leakage device with breaker or a combination MCB/RCD must be installed on the output. Cable size must be adjusted accordingly.
IMPORTANT INFORMATION !
Recommended AC Out-2 cable/breaker size Quattro
AC Out-2 only is available when power is present on AC IN-1 or AC IN-2.
During battery operation it will be disconnected.
AC Out-2 supports up to 50A.
An Earth leakage device with breaker or a combination MCB/RCD must be installed on the output. Cable size must be adjusted accordingly.
IMPORTANT INFORMATION !
Recommended AC IN-1 & AC IN-2 cable/breaker size Quattro
AC IN-1 & AC IN-2 both must be protected by a circuit breaker rated at 50A max or less. This depends heavily on the size of the connected power source.The input currents must be adjusted to fit the size of the connected power sources. The breaker and cable size for both AC IN-1 & AC IN-2 should be adjusted accordingly.
IMPORTANT INFORMATION !
Recommended DC cable/fuse size Quattro
0-5m cable length: 4 x 50SQmm 5-10m cable length: 4 x 95SQmm. When used in closed conduits, cable size should double. Cable length stands for the distance between the battery and the Quattro. Recommendations are without other loads in the system and these also should be taken into account for proper main battery, main fuse & main switch cables ! Fuse size should be 1 x 400A.