

VOTRONIC

Installation and Operating Manual

Cable Set for Connection Solar Charging Controller at EBL Order No. 2007



Make sure to validate the compatibility of your Schaudt Elektroblock (EBL) with its control and display devices in advance because we are not able to give any warranty in cases of incompatibility.

For further information, please visit our website under the menu item "Solar Controller technology".

Please read the installation guide thoroughly prior to installing the cable set and before starting connection and start-up.

Purpose of use:

The ready-made cable set is designed for connection of the VOTRONIC Solar Controllers of series

SR 140 Duo Digital to SR 530 Duo Digital as well as

MPP 165 Duo Digital to MPP 430 Duo Digital

at an existing electroblock (EBL) with connected control and display panel series DT... / LT...

The VOTRONIC Solar Controllers of the above-mentioned series supply a suitable "solar current" measuring signal to the terminal "EBL".

The cable set comprises:

1. Connection cable X for charging of the board battery by the solar controller.
2. Connection cable Y for the signal solar charging current board battery by the solar controller to EBL DT..../LT....

Connection:

Depending on the execution/equipment a **15 A** or **20 A "Solar" fuse** is destined. If required, please **insert** another fuse of the indicated strength.

Depending on type (capacity) of the solar controller **Connection Plan 1.) or 2.)** is to be used.

The connection plan 2.) is always to be used, if the efficiency of the solar controller exceeds the strength of the "solar" fuse in the EBL. In this case, the solar controllers are to be connected directly to the board battery. Please observe the cable lengths and cable cross-sections (referred in solar-controllers manual).

Note: After connection of the cable Y for the signal "solar charging current board battery" an **activation** of the EBL (software) for the solar charge might possibly be required.

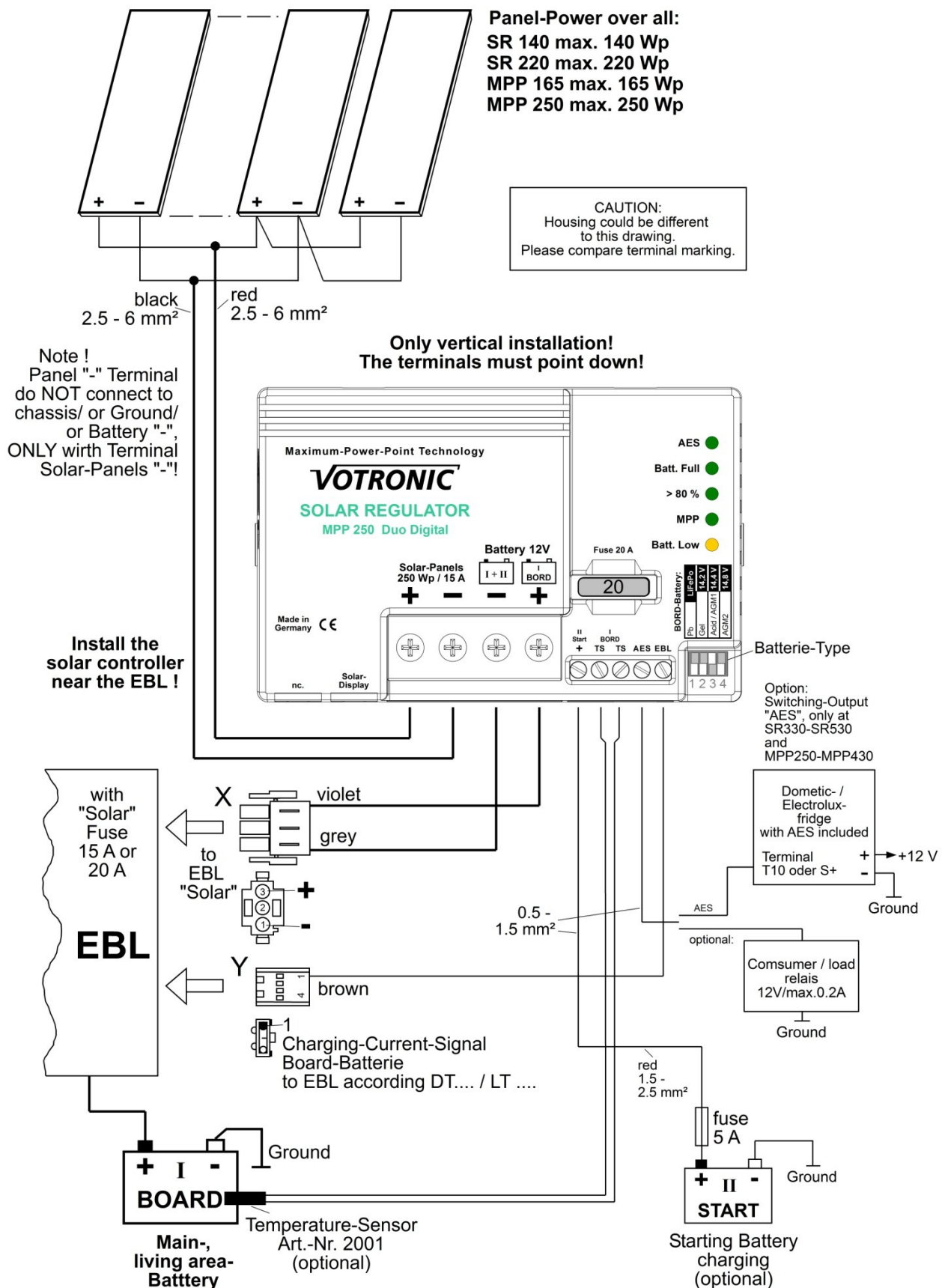
In this case, please address to the supplier or manufacturer of your vehicle.

The charging port "**It start battery**" of the solar controllers is led separately to the starter battery.

Due to its small cross-section, the cable can also additionally be clamped to the EBL at a suitable position at a connection for the starter battery.

The solar controllers supply a charging current with reduced and limited voltage and current rates for trickle charge of the starter battery. Thus, the valuable solar power will be supplied to the board (living area) battery being more suitable, maintaining the starting capability of the vehicles battery at the same time. So, the low trickle charge current for the starter battery will not be displayed.

1.) Connection Plan SR 140/220 Duo Digital and MPP 165/250 Duo Digital:



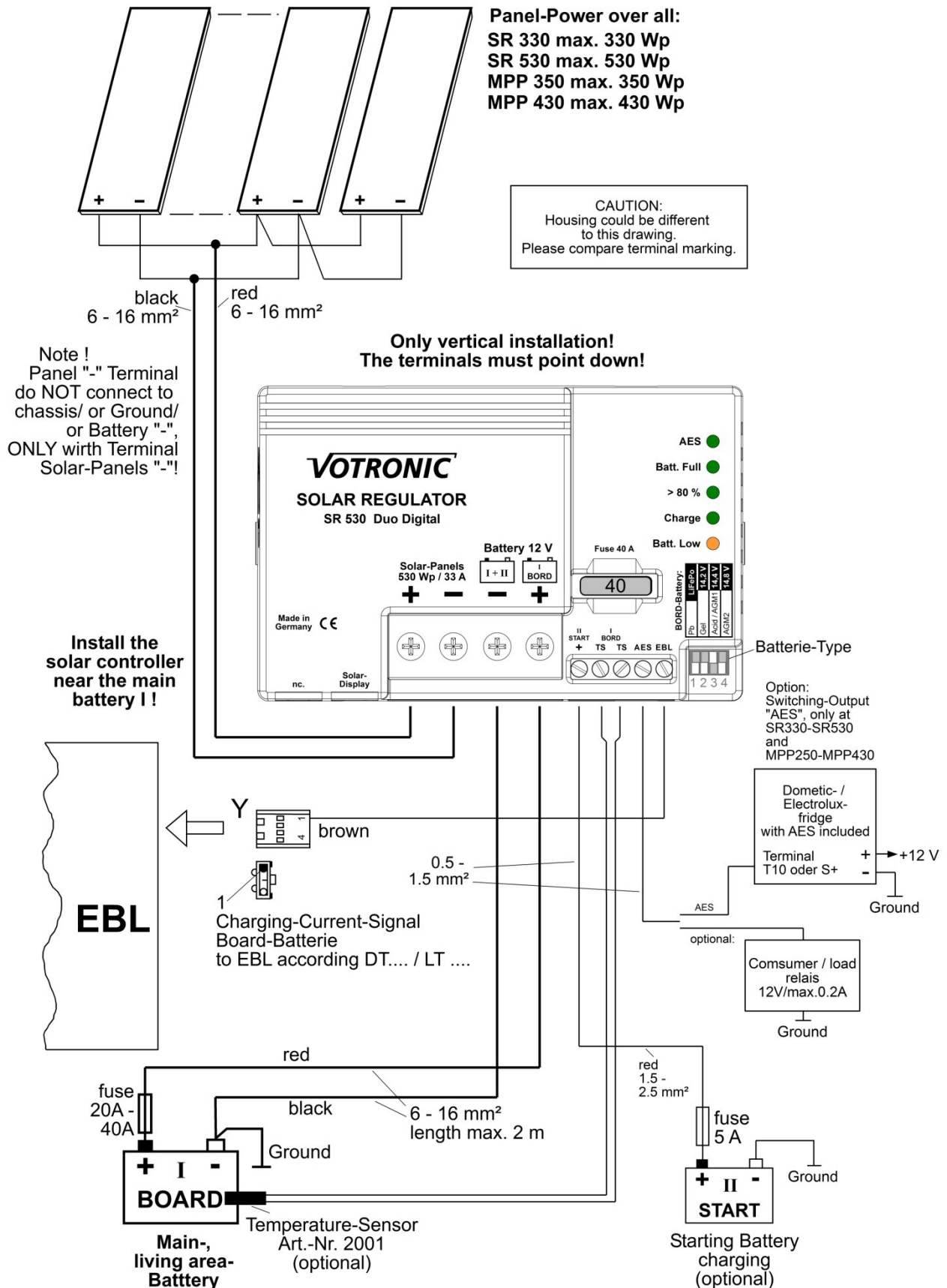
Due to their efficiency, the SR 220 Duo Digital and MPP 250 Duo Digital can only be connected to EBL with a "solar" fuse **20 A**!

Case of EBL with "solar" fuse only **15 A**:

SR 220 Duo Digital und MPP 250 Duo Digital must be connected directly to the main (living area) battery like 2.), shown on page 3, SR 330/530 Duo Digital and MPP 350/430 Duo Digital.

The display of the solar current on the EBL is still effected by the cable "Y".

2.) Connection Plan SR 330/530 Duo Digital and MPP 350/430 Duo Digital:



Never lead the charging cables over the solar connection of the EBL, since eventually existing charging currents supplied by the efficient solar controllers might be too high!

Therefore, the solar controllers must be connected directly to the main (living area) battery, X cable is not used. Please observe the indicated cross-sections and lengths of the cables. The display of the solar current on the EBL is still effected by the cable "Y".

Own Notes:



The product must not be disposed of in the household waste.



The product is RoHS compliant. It complies with the directive 2015/863/EU for Reduction of Hazardous Substances in electrical and electronic equipment.

**Quality Management
System**

DIN EN ISO 9001

Delivery Scope:

- Connection Cable X - Charging Living Area Battery (Length: 1 m)
- Connection Cable Y - Signal Display Solar Charging Current Living Area Battery (Length: 1 m)

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