

# Extending SolShare CT tails

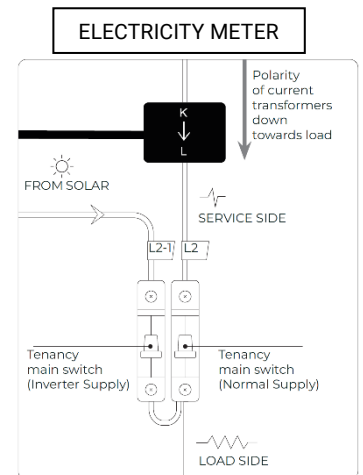
## I/ Disclaimer

This document is intended to provide guidance on how to extend CTs provided with SolShare. This document does not override the local electrical safety standards and wiring rules. It is the responsibility of the installer to ensure the shared solar installation meets the relevant electrical safety and wiring standards in the installation locality.



## II/ SolShare CTs

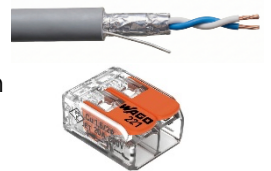
- Each SolShare is shipped with 15 CTs, typically [EChun ECS16-120 split core CTs](#).
- Each CT has a 10m tail attached.
- Each CT box, CT and its connected tail is marked with a SolShare output (e.g., **L2-1**) for ease of installation.
- As part of a SolShare installation, for each SolShare output receiving solar, 1 SolShare CT must be installed between the electricity meter and the solar point of connection (measuring grid import/export).
- For more information on how to install SolShare CTs, please see the latest version of the [SolShare Installation Manual](#).



## III/ Extending CT tails

If the installation location requires a tail length of a CT over 10m, the tails can be extended up to 100m. This should be done using:

- Shielded, twisted pair cable of gauge **0.25mm<sup>2</sup> (24 AWG) or larger**, rated for at least 400V or separately sheathed, and compliant with AS/NZS 3000, and any other relevant standards and regulations (e.g., shielded Cat6 or Instrumentation Cable).
- Splicing connector / pluggable terminal block (e.g., [Wago 221 series](#)) or similar. Ensure the connector is a suitable size for the cable gauge being used.



Additional tips:

- **Shielding must be grounded** - this can be done at SolShare using the SolShare grounding bar.
  - Use splicing connectors to group CT shield grounding conductors
  - Minimise length of exposed grounding wire
  - Use cable-ties to provide mechanical strain relief and maintain isolation to power conductors
  - Use insulated cable to extend earthing connection
- Ensure there is good electrical contact between tail/extension/s.
- Ensure shielding is not compromised along the extension/s and tails (e.g., avoid the use of sharp objects like metal cable ties on these tails/wires).
- Label the extended tail with the same SolShare output name (e.g., **L2-1**) as is written on the original part of the tail and the CT. This will help to ensure the correct CT tail is inserted into the correct terminal on the SolShare during installation.

