

70A split core current transformer (CT) connection guidelines to an energy meter with Modbus connection

Dear SolarEdge customers,

SolarEdge would like to inform that all 70A small form factor split core current transformer (SE-CTML-0350-070) provided before February 7th 2020 have a CT label with a reverse arrow direction (see below), and should be installed according to the guidelines specified in this document.



CT with a correct label



CT with a reversed label

How to identify if a certain box of CTs is with the correct/reversed CT label:

CTs with correct label meet one of the following conditions:

- CTs are packed in a dedicated box (one CT per a carton box)
- Three CTs are packed in a box which is marked by a black dot (see image)

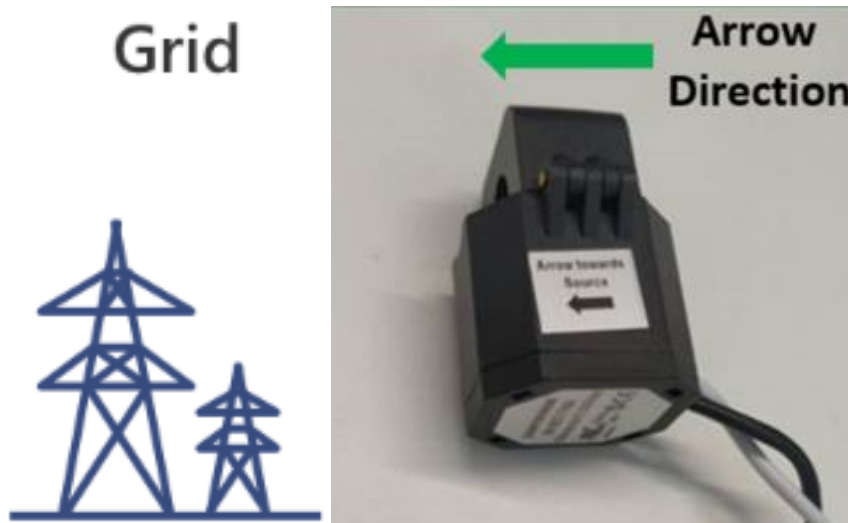


CTs with reversed label are packed 3 in a box, and the box is not marked by a black dot.

Proper installation guidelines

CT with a correct label:

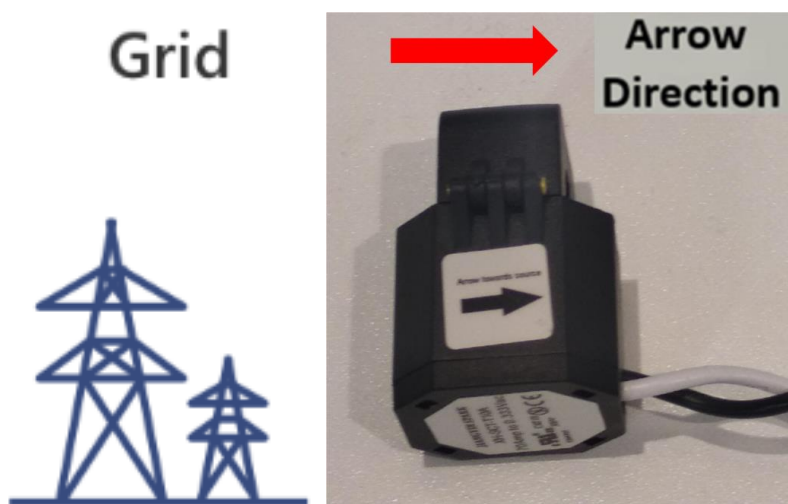
The label showing the CT connection direction should point to the opposite side of the twisted pair cable (as shown in the picture below), and the arrow should point in direction of the grid connection point.



CT with a correct label

CT with a reversed label:

If the CT label's arrow points to the twisted pair cable side (as shown below), make sure to install the CT in a way that the CT label's arrow points in the opposite direction of the grid connection point.



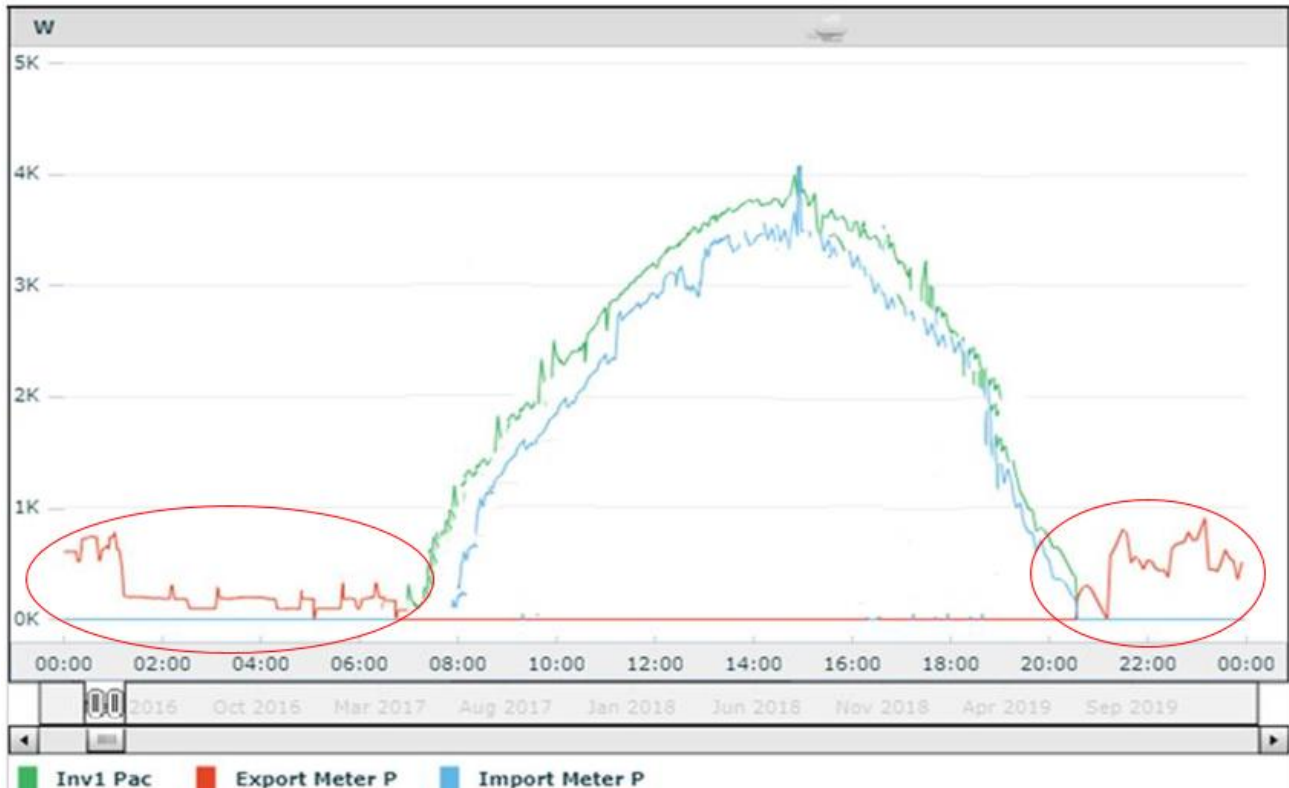
CT with a wrong label

Existing installation: How to identify reversed CT direction

CTs installed in reverse direction can be identified by looking at the dashboard in the monitoring platform. Export energy at night time hours is a clear indication – see the red circles in the picture below.

The issue can be fixed in one of the following ways:

1. Reverse the CT orientation relative to the conductor
2. Swap the black/white twisted pair at the meter's CT terminal blocks



Export during night time, displayed in the monitoring dashboard when CTs are installed in a reverse direction