



Terra AC: TerraConfig App Step by Step Guide

Introduction

Fully connected

TerraConfig smartphone app

- User is typically the installer or technical operator / support engineer.
- User can be granted an App account via the TerraConfig Portal. An ABB employee must create the account.
- The user can access any charger in proximity range (Bluetooth connection).
- Search for the charger and pair via pin code verification (the same pin code that is used with ChargerSync App)
- Goal is for the installer is to configure settings while commissioning.



Introduction

Fully connected

TerraConfig smartphone app



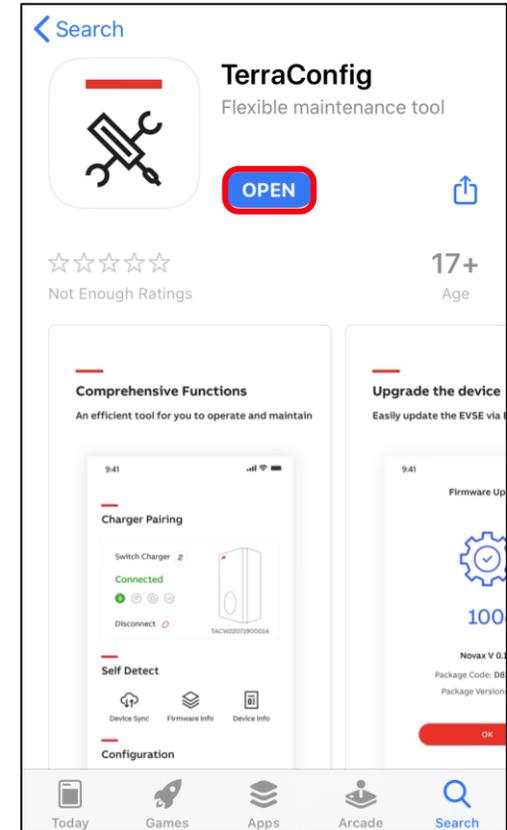
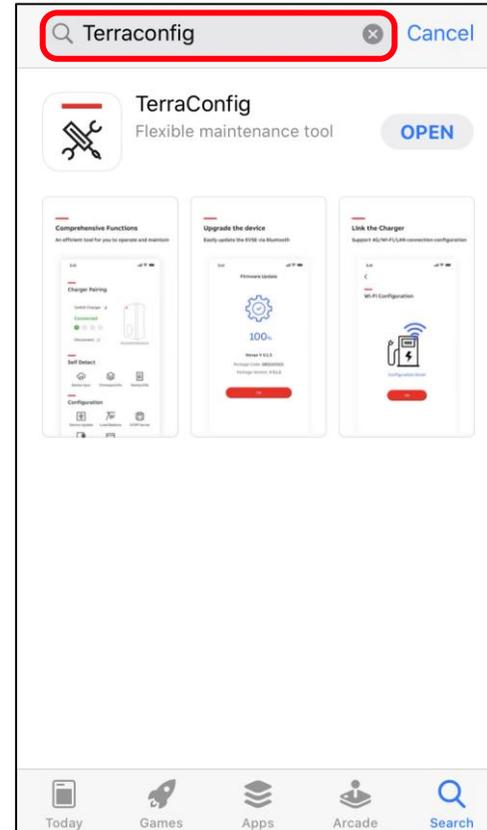
Functionality:

- Device Sync - to synchronize charger with ABB back-end server
- Firmware info
- Device info (error + session logs)
- Device update (firmware update)
- Charger link (connectivity options)
- OCPP server (configuration)
- Settings (user-settable max static current limit)
- Card (enable external RFID cards)
- Device mode (free vending mode)

Where to find the TerraConfig App?

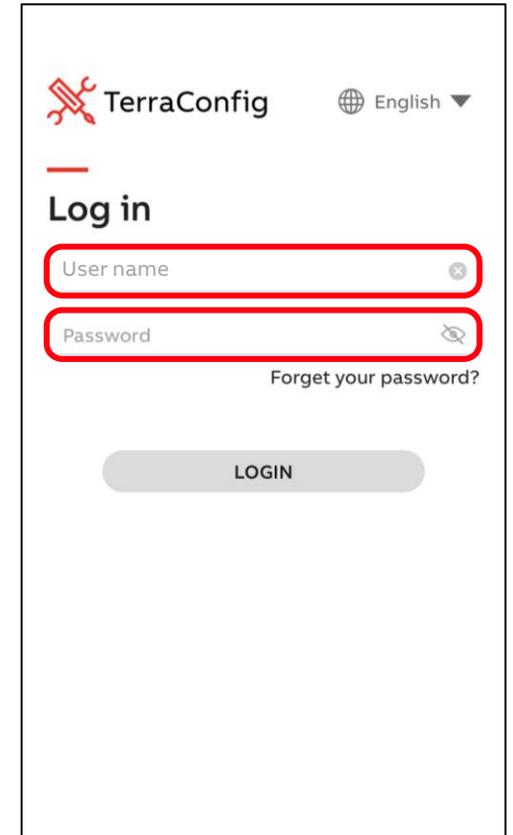
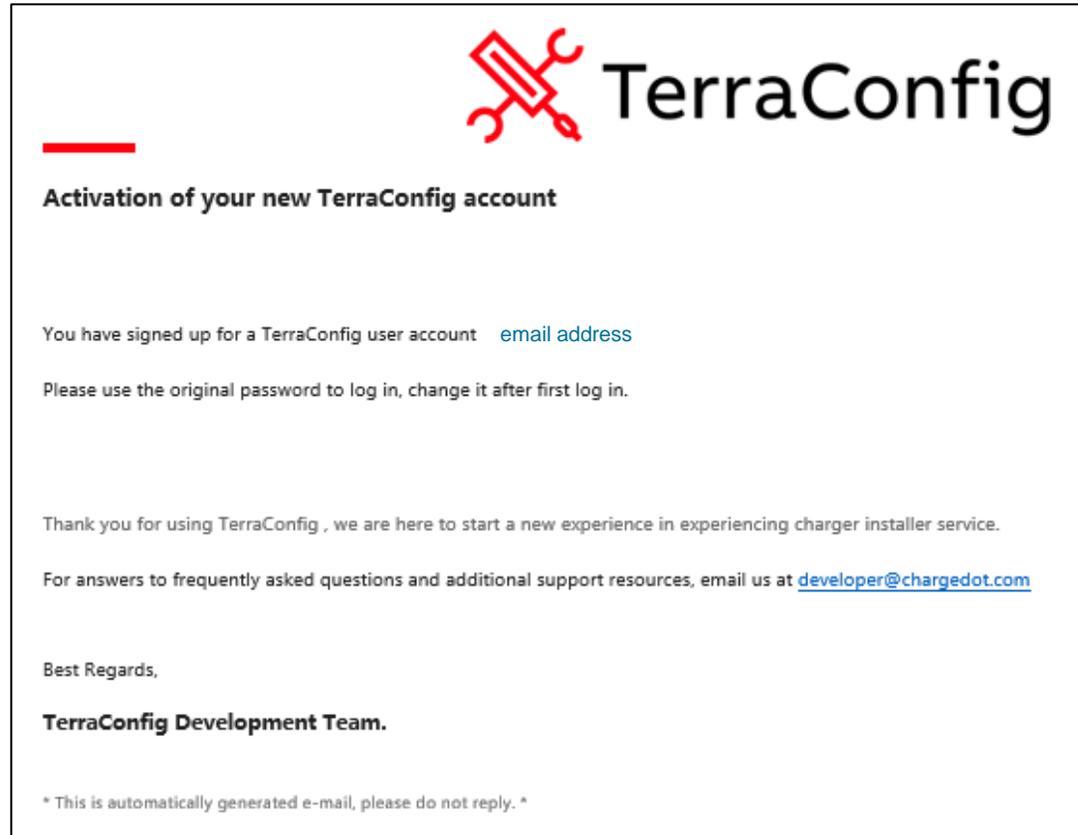
“TerraConfig” in App or Google play store

*Note:
Previously downloaded TerraConfig App need
to be updated to minimum version 1.3.*



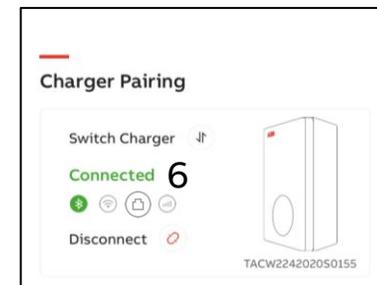
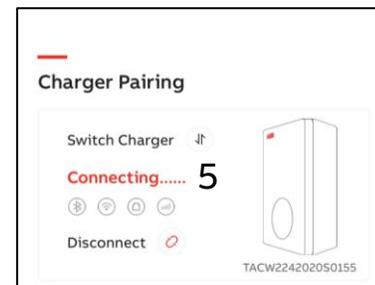
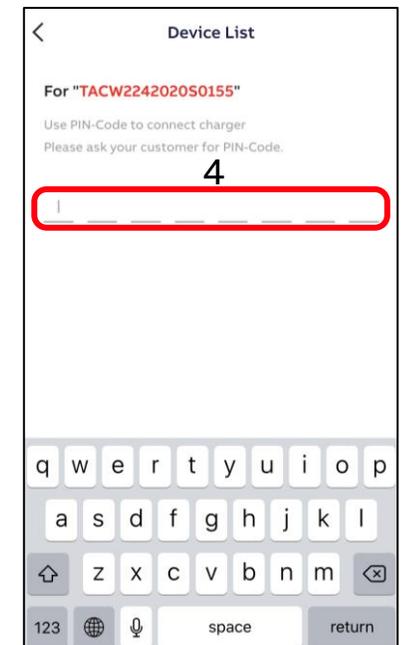
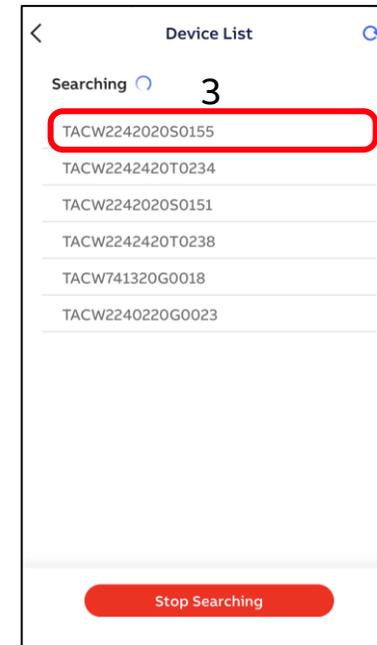
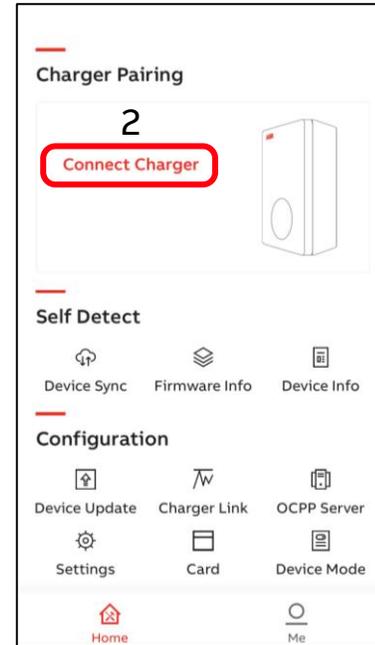
Log in with TerraConfig account

- Install and open TerraConfig App
- Log in with credentials received by email upon account request.
- Follow the steps to create your own password and log in.



Connect to Charger

1. Smart phone needs to be connected to the internet and Bluetooth connection enabled
2. Press 'Connect Charger' to activate search for Charger
3. Select your Charger from the Device List by Serial Number
4. Enter the Pin code (letters + numbers) given by Charger owner and press 'Continue'. **See next slide**
Note: owner can change the pin code by ChargerSync App
5. TerraConfig App will connect to that charger
6. Charger is connected to TerraConfig app via Bluetooth



Connect to Charger

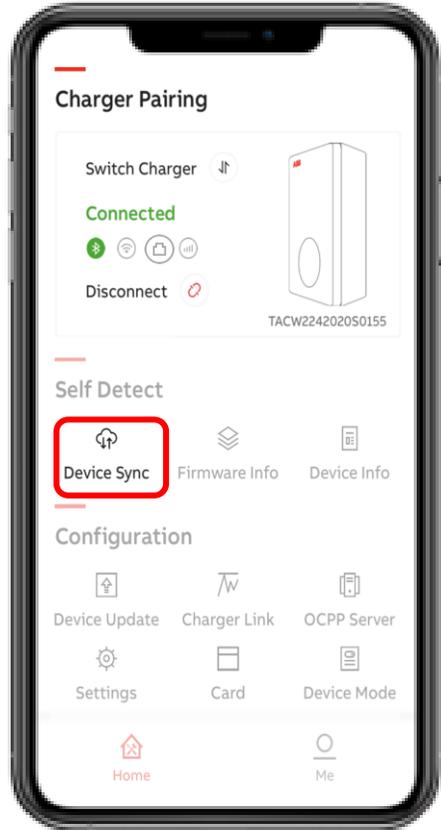
1. Charger Serial Number and PIN Code shown on the leaflet that came with the charger

Terra AC EVSE Indicators Status

Charging	Advanced
<p>Step 1 Connect the EVSE</p> <p>Connect the EV to the EVSE, when your EV is detected the EV link indicator will flash green.</p>  <p>EV Link Indicator—Flashing green</p>	<p>Connecting to the internet</p> <p>When the EVSE is connecting to the internet, internet connection indicator will flash green.</p>  <p>Internet connection indicator—Flashing green</p>
<p>Step 2 Authorization</p> <p>When the EVSE is authorized via RFID card (beep once), the indicator will light up green.</p>  <p>EV Link Indicator—Light up green</p>	<p>Internet connected</p> <p>When the EVSE is connected to the internet, internet connection indicator will light up green.</p>  <p>Internet connection indicator—Light up green</p>
<p>Step 3 Charging</p> <p>When the charging start the charging indicator will flash green.</p>  <p>Charging Indicator—Flashing green</p>	<p>Error</p> <p>When the EVSE is in error status, the error indicator will light up red.</p>  <p>Error indicator—Light up red</p>
<p>Step 4 Charging Complete</p> <p>When the charging complete the charging indicator will light up green.</p>  <p>Charging Indicator—Light up green</p>	<p>Scan QR Code for more information</p>  <p>Manual</p> <p>Scan QR Code to download APP</p>  <p>PIN Code</p>  <p>PIN CODE: 8najb1x5 SN: TACW744220P0728</p>

Home screen

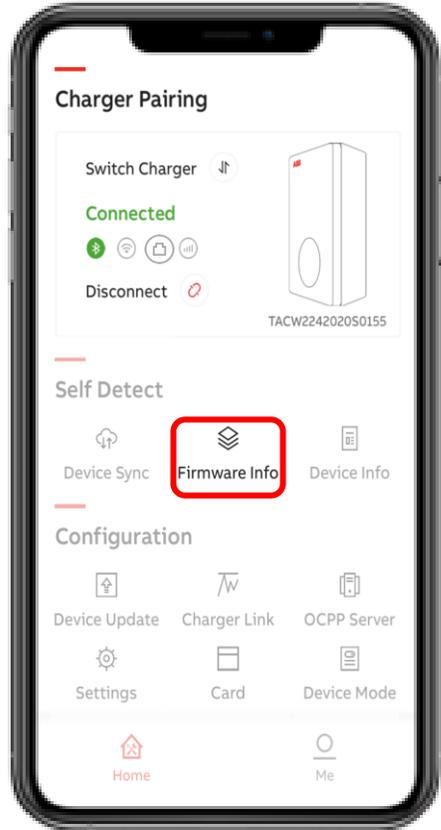
Device Sync



- 'Device Sync' allows the charger to be manually synchronized with the ABB back-end. Recommended to always press 'Device Sync' after commissioning/changes done by TerraConfig App

Home screen

Firmware Info

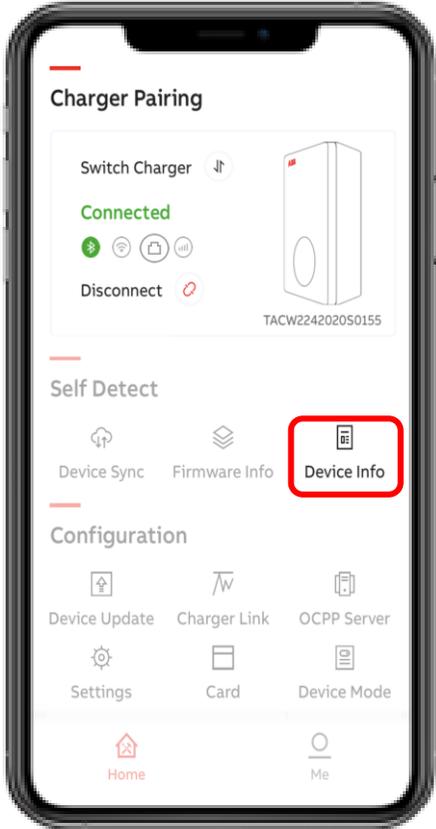


- In 'Firmware Info' package version/ firmware version can be found.
- Firmware is updated often. Tap "Device Update" to get the latest firmware version.



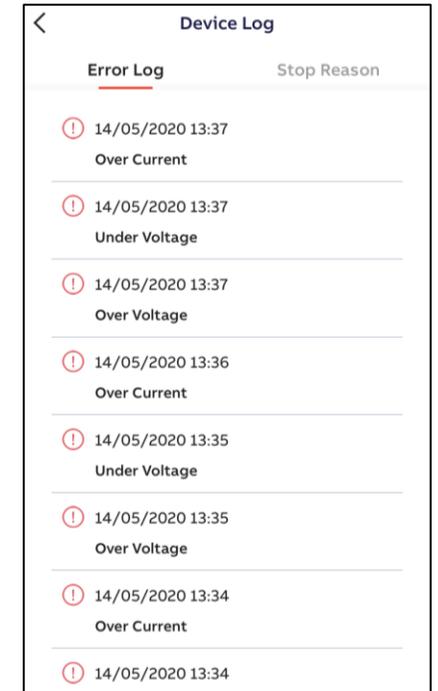
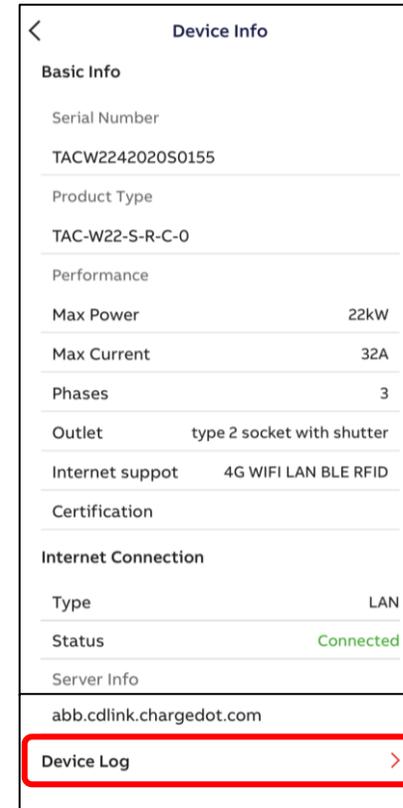
Home screen

Device Info



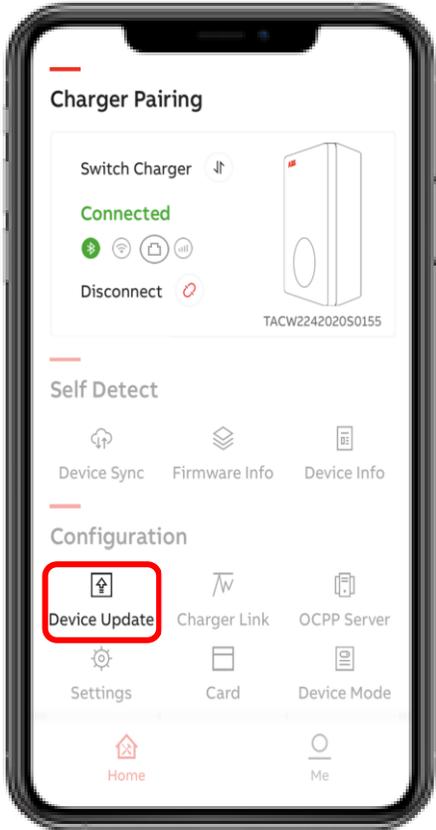
With 'Device Info' the user can find product details as well the Device Log in case diagnostics are needed.

- *Serial Number*
- *Product Type*
- *Max Power (kW)*
- *Max Current (A)*
- *Phases*
- *Outlet*
- *Internet support*
- *Certification*
- *Live status of Internet Connection*
- *Server Info*
- *Device Log*



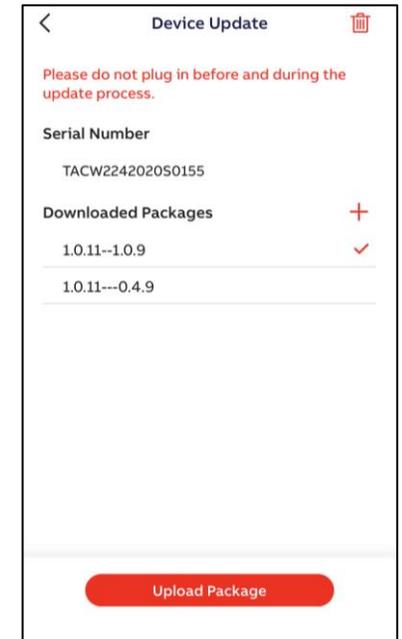
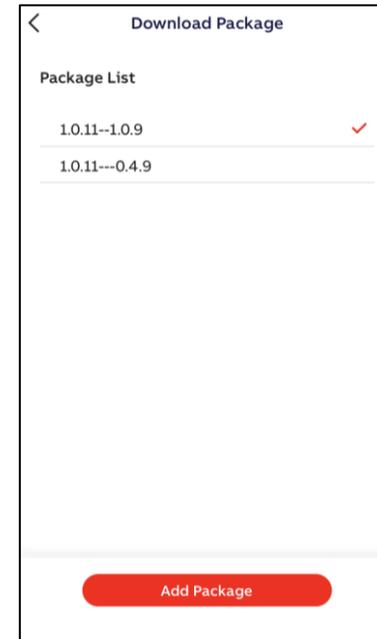
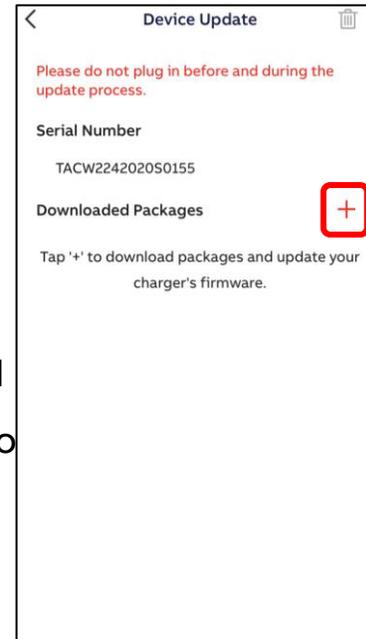
Home screen

Device Update



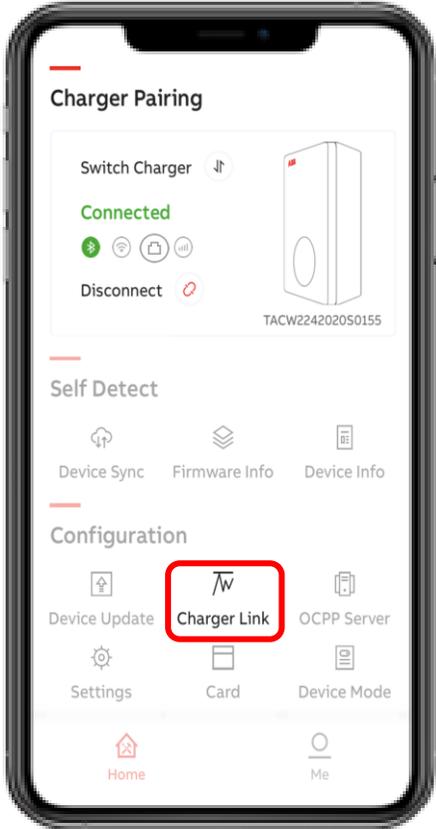
With 'Device Update' the latest firmware or specific version can be downloaded and uploaded to the charger.

Press "+" and the TerraConfig App will search for available Firmware followed by Add Package and Upload Package to the charger.



Home screen

Charger Link



With ChargerLink the charger internet connectivity option can be selected.

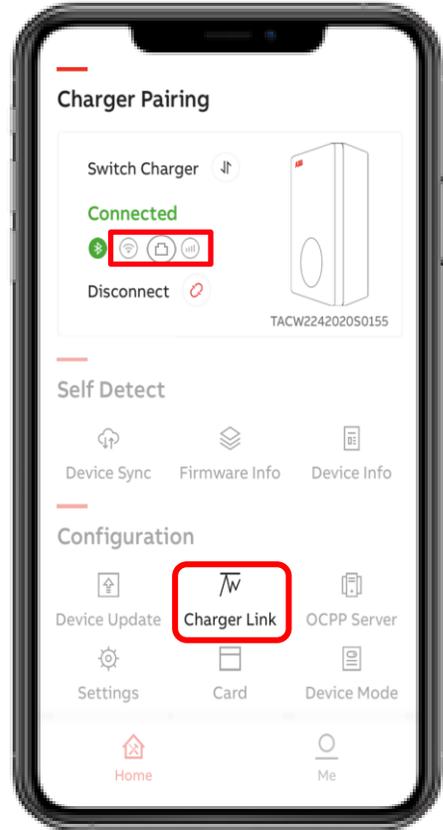
Options are

- LAN (default)
- Offline (When using the charger in offline mode only the status connectivity LED can be disabled)
- Wi-Fi
- 4G

Note: When switching from LAN to WiFi or to 4G you will need to “Reconnect” the charger

Home screen

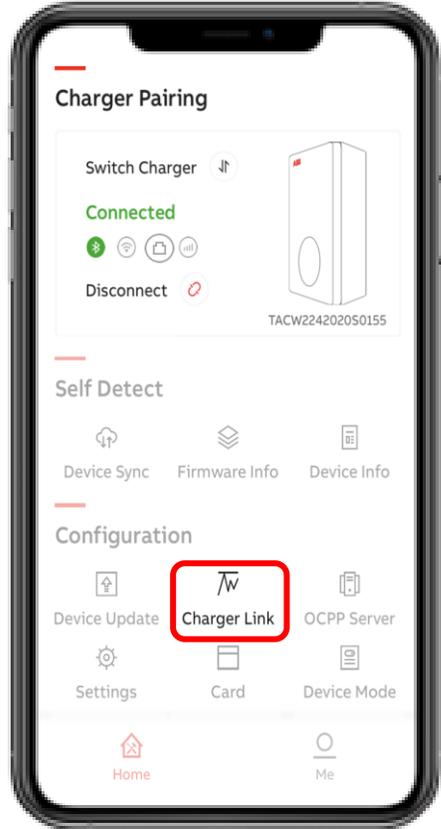
Charger Link



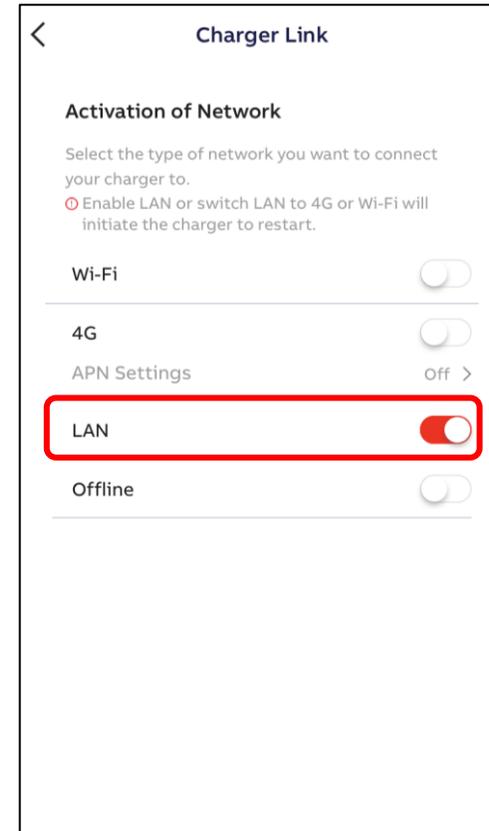
Whichever method you select to connect to the internet, the appropriate icon will turn green

Home screen

Charger Link

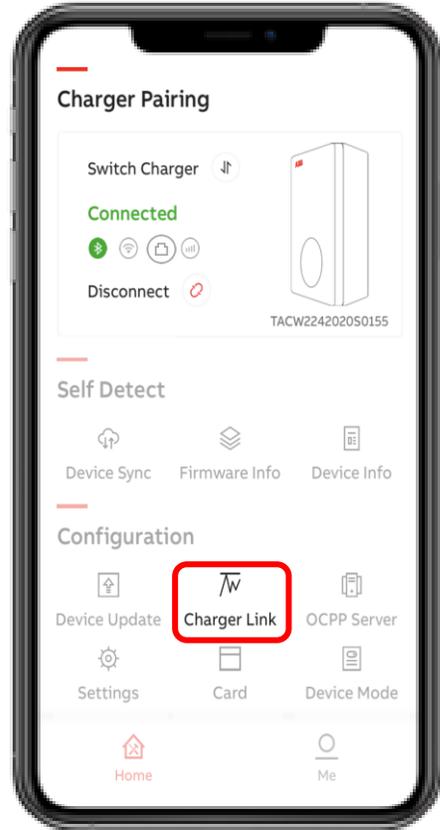


- Select which method you want to connect to the internet. Steps are the same regardless
- An internet connection needs to be made before a connection to an OCPP connection can be made



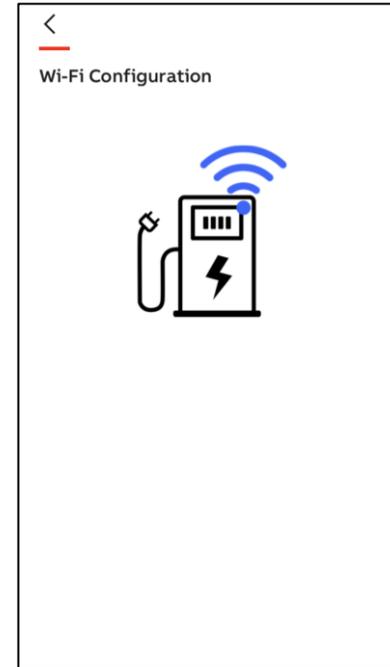
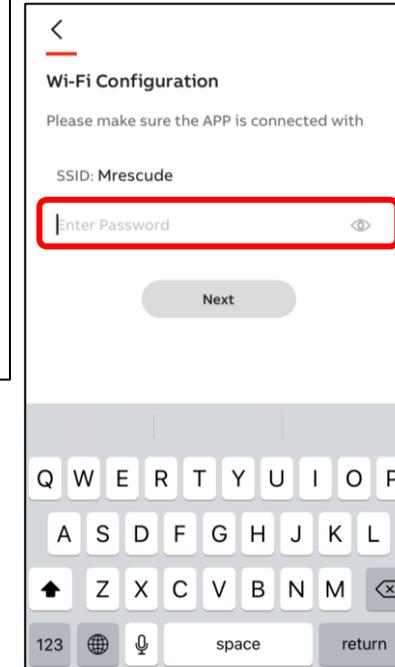
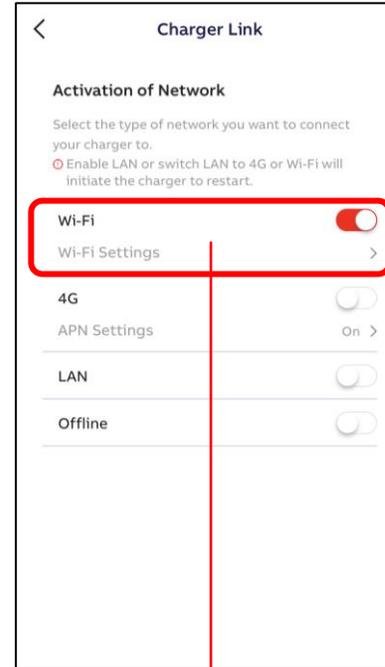
Home screen

Charger Link – Wi-Fi



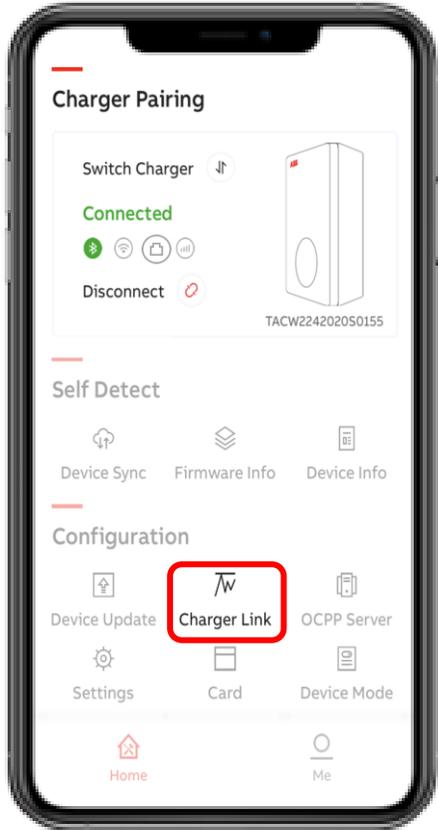
Charger can only be connected to a 2.4GHz SSID. You will need to turn off the 5GHz in your modem to connect the charger then turn back on the 5GHz.

- Enable Wi-Fi and press Wi-Fi Settings
- SSID shows the connected Wi-Fi network. **Your phone needs to be on the same SSID WiFi Connection**
- Enter Wi-Fi password and press 'Next'
- Charger will connect to Wi-Fi network but it will not be instant like on your phone.
- Scroll back to the home screen to verify the WiFi icon is green

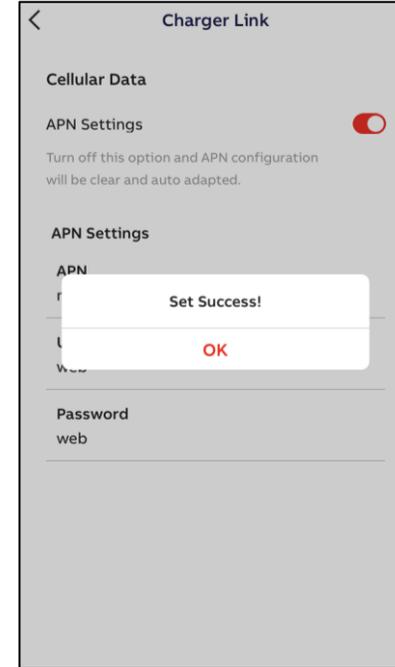
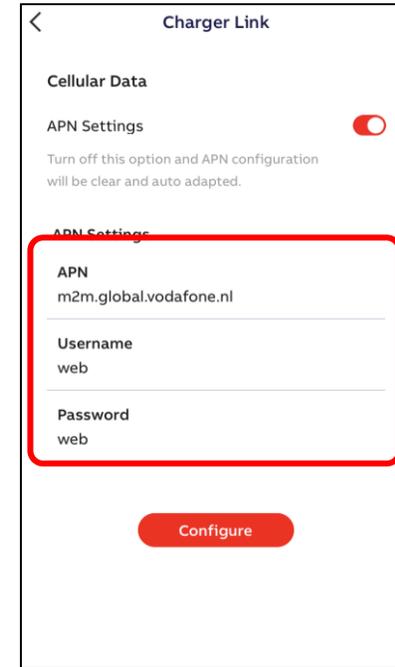
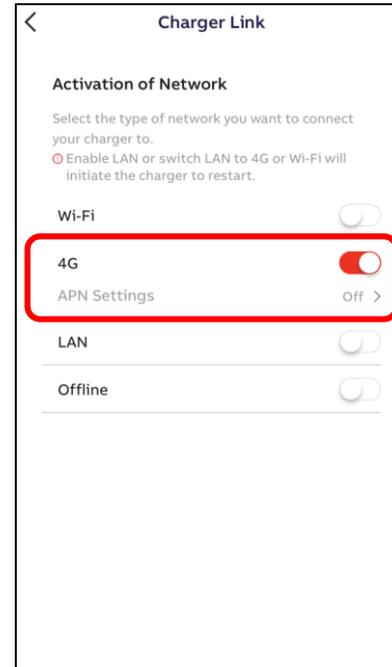
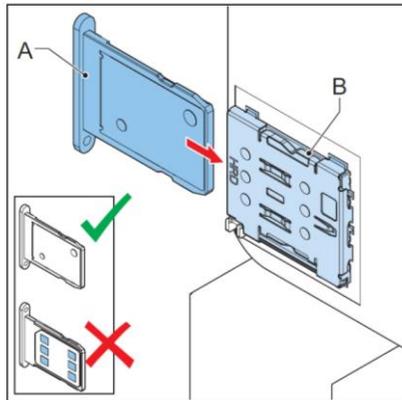


Home screen

Charger Link – 4G

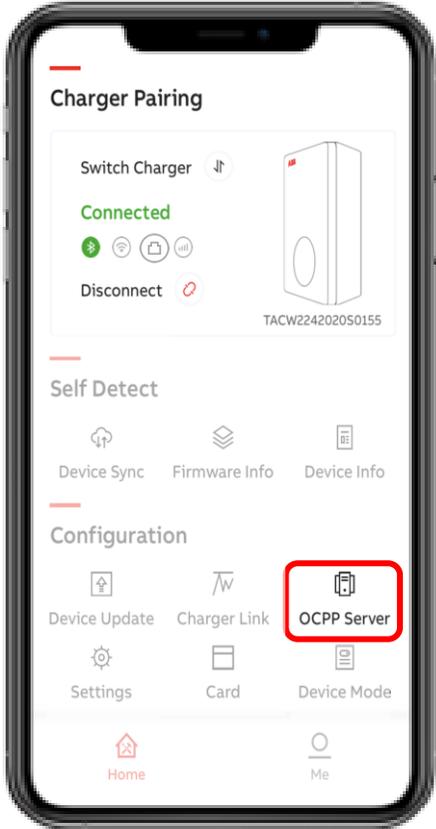


Before configuring the Charger 4G connection insert the m2m nano sim card - enable 4G and enter APN settings (example Vodafone-(T-Mobile or AT&T US)) and press Configure.

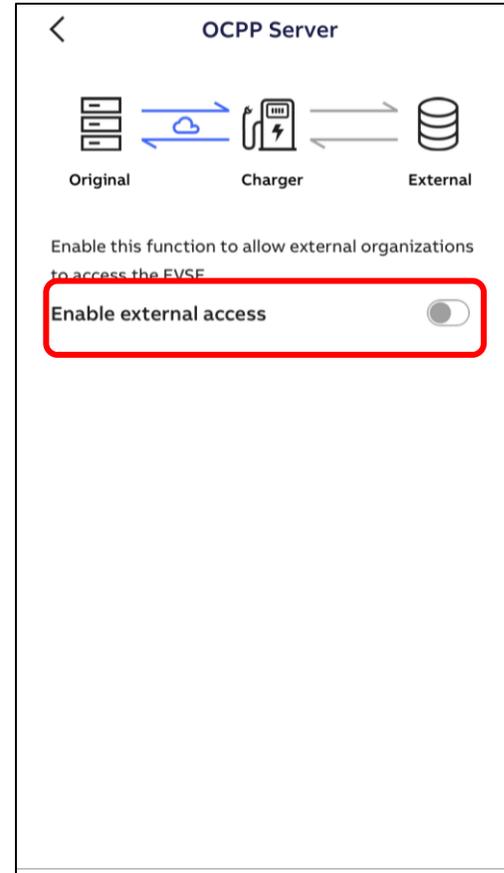


Home screen

OCPP Server



- Tap OCPP Server
- Turn off Enable external server. By doing this you are establishing and testing the chargers communication to the ABB non secured backend. Do this before connecting to your secured (WSS) or non secured (WS) OCPP backend of choice.
- Scroll back to the main screen and wait for a few minutes till the appropriate Internet Connection method you've chosen turns green.
- Once it turns green tap "OCPP Server" and you are ready to establish your OCPP connection to your OCPP backend of choice



Home screen

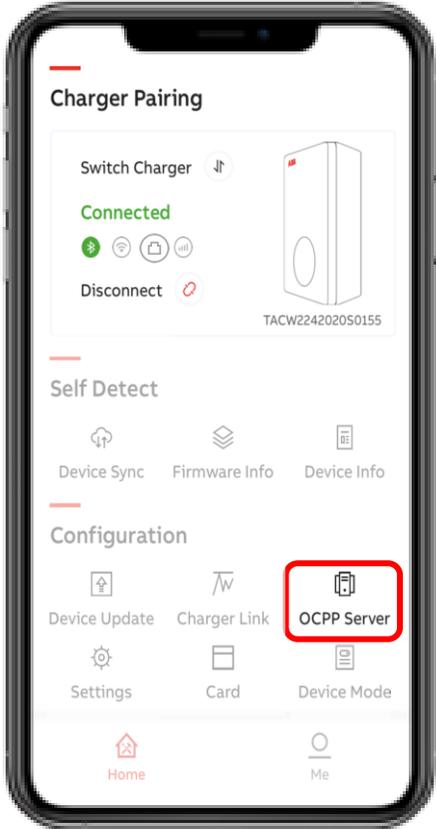
OCPP Server



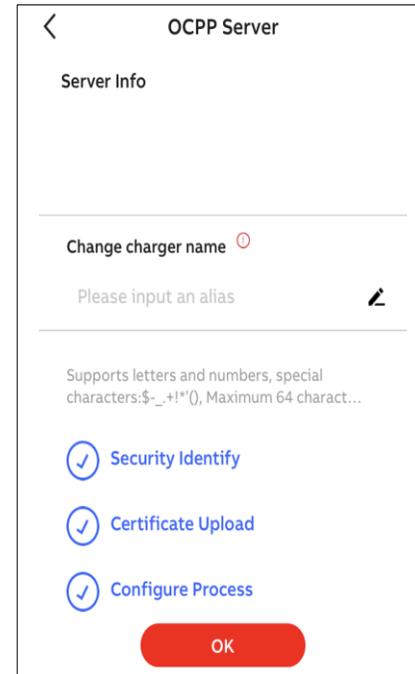
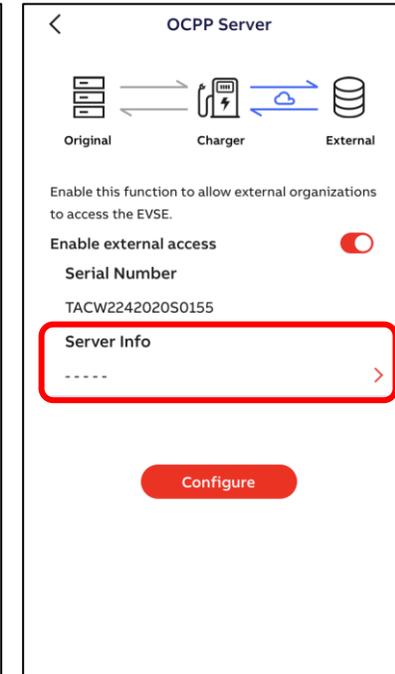
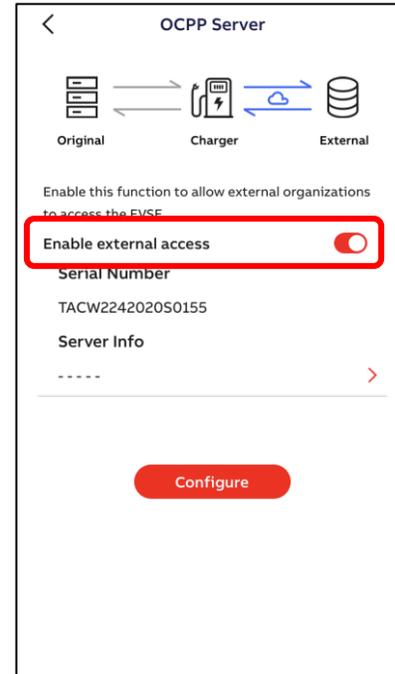
- To establish an OCPP connection, tap the “Locally Cached Server” + symbol
- All available servers will appear below
- Tap one of the servers and tap Next

Home screen

OCPP Server

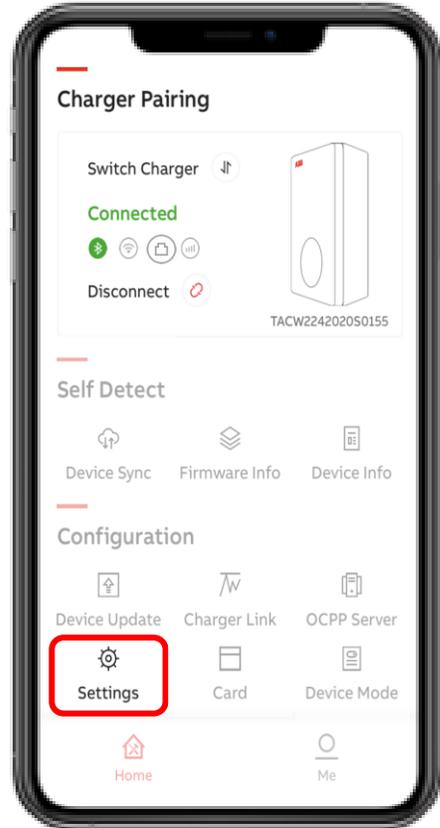


- Turn on “Enable external access”
- Select the appropriate server and tap “Configure”
- If successful, you will see 3 blue circles. This represents a ping was sent to the OCPP server you’ve selected.
- Tap **OK**



Home screen

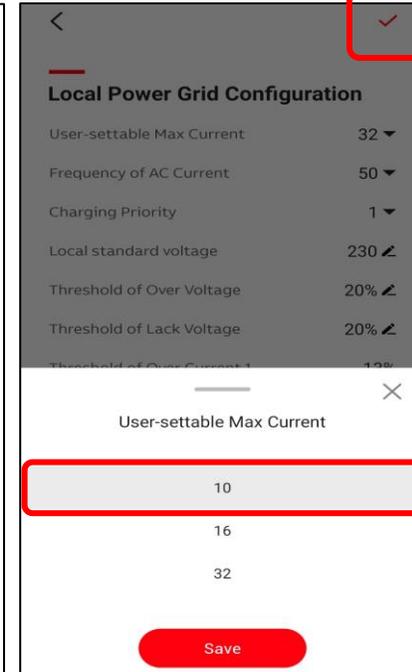
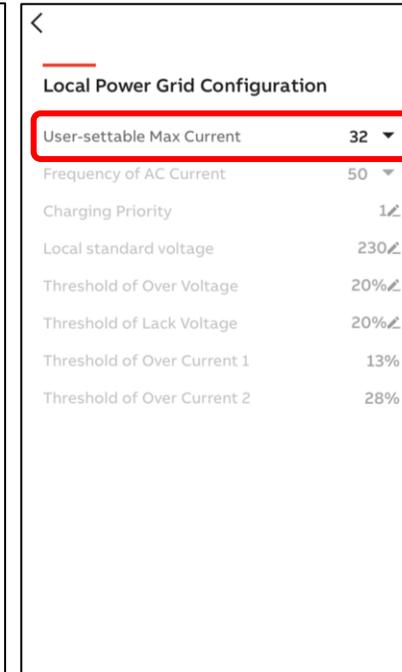
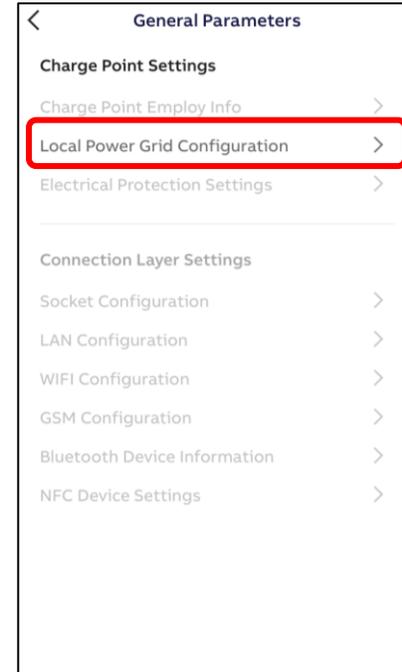
How to configure User Settable Max Static Current Limit?



Use 'Settings' followed by 'Local Power Grid Configuration' **only** to configure the 'User- settable Max Static Current'. The Charger can be limited to 1A increments. Press 'Save' and red check mark (top corner right) to confirm.

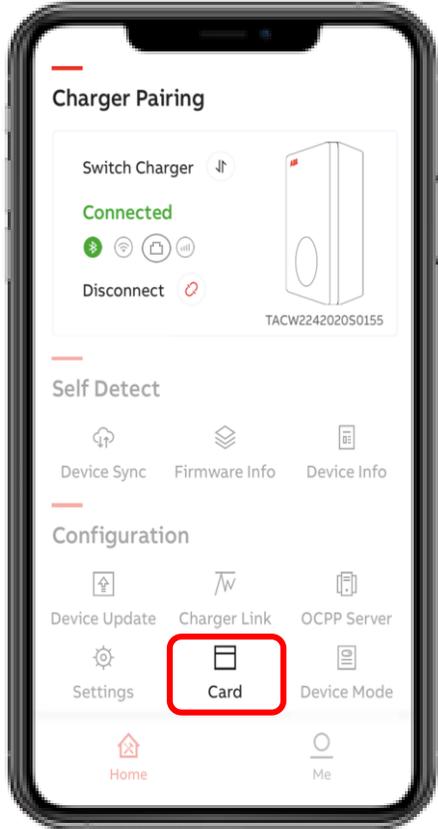
The max static limit is not accessible by ChargerSync App.

Please do not use other visible menu items as this will be improved in the next release.



Home screen

Card

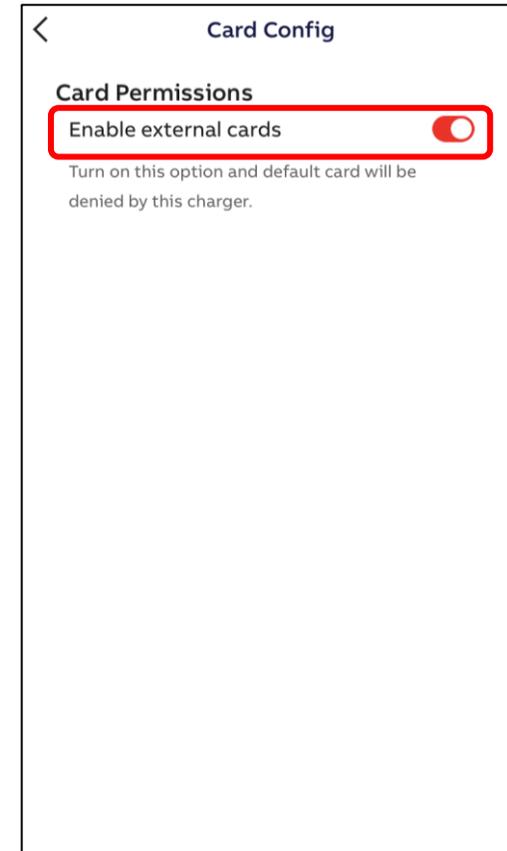


Use Card menu to 'Enable external 3rd party RFID cards.

Following cards are compatible:

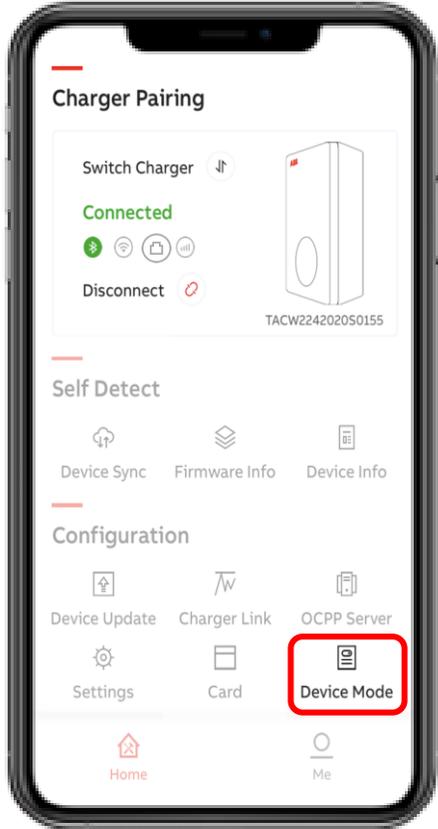
- SO 14443 type A and type B, UID 4 bytes.
- The UID 7 bytes will be available in the next release.

If the RFID type is unknown an additional 'NFC' tool can be used. Preferred from google play store as most of the NFC tools from App store do not work.



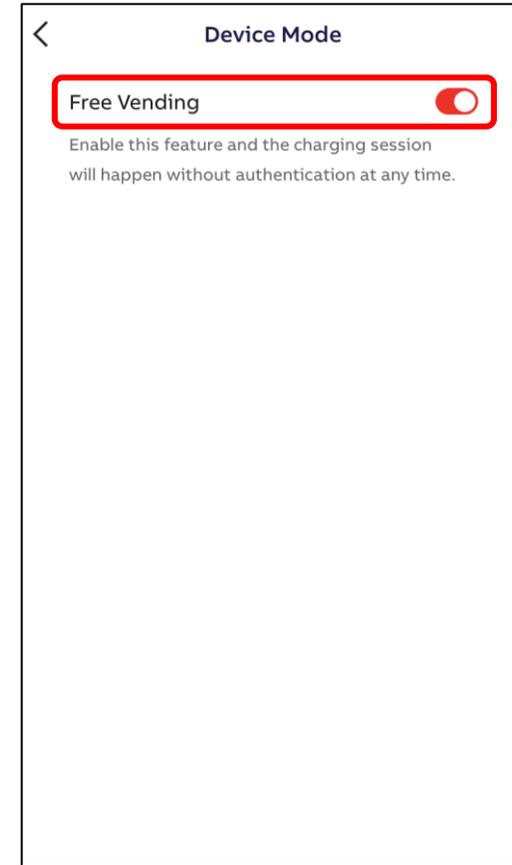
Home screen

Device Mode



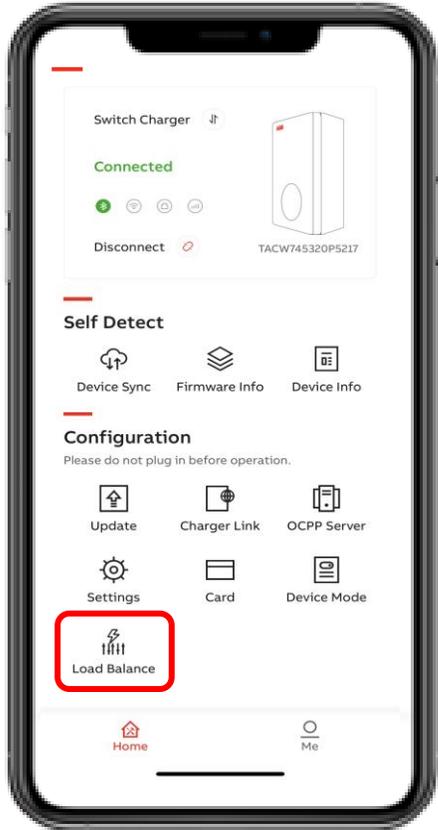
With “Device mode” the Terra AC Wallbox can be enabled for free vending mode.

- **no authentication** (RFID authorization/ChargerSync App is not needed)



Home screen

Load Balance

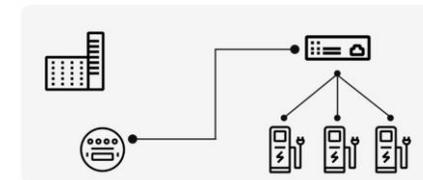
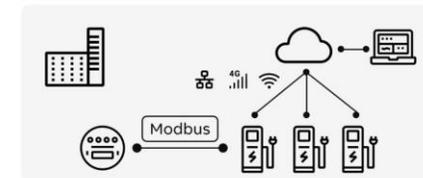
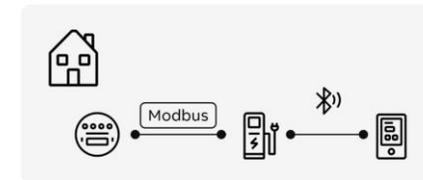


With “Load Balancing” the Terra AC Wallbox Chargers can have different current settings depending on load requirements

Load Balancing

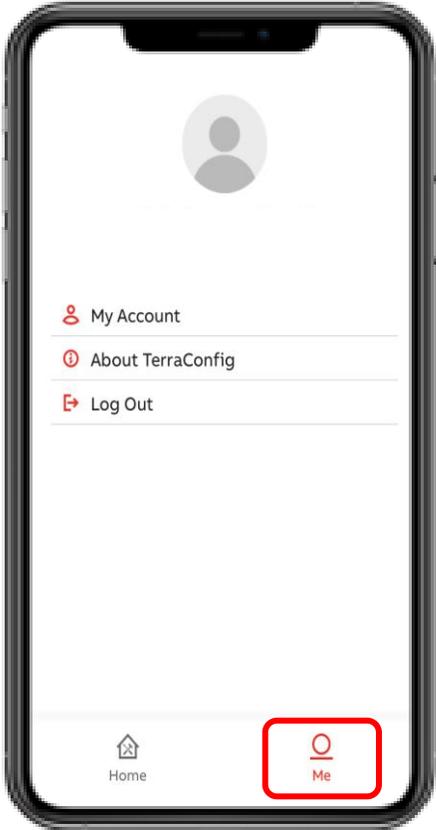
Please enable Modbus and select one of the following options.

Modbus



Me

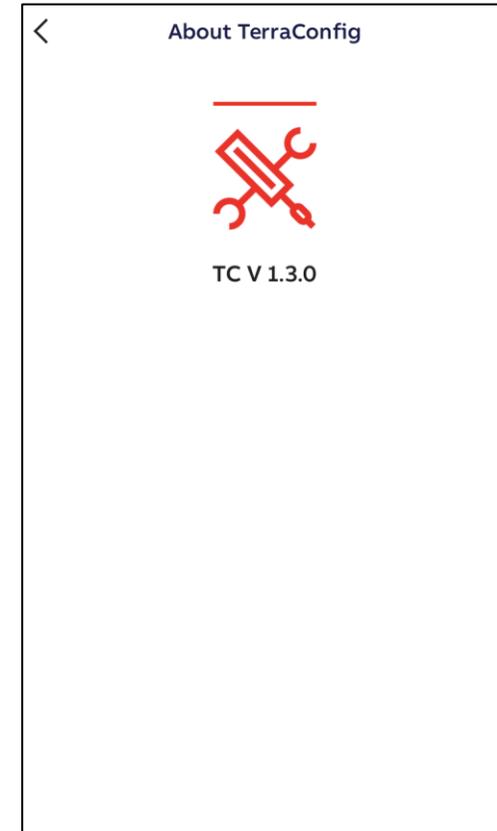
My Account and About TerraConfig



In Me section the TerraConfig account can be managed.

- in 'My Account' it's possible to edit username and change password of TerraConfig app account.

- in 'About TerraConfig' TerraConfig App version can be found



ABB