Rchrgd

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| (| 15:15 | |
|-------|------------------|--------------------------------------|
| | < Back | Configuration |
| | | VCHRGD Seven |
| | WiFi SSID: | BTB-JWCGCT |
| | WiFi connectio | on OK |
| | WiFi Passwo | rd: |
| | 4G APN: | Max length: 32 characters |
| | 4G Account: | Max length: 32 characters |
| * | 4G Password | d: Max length: 32 character |
| 61. | Server URL: | Secure |
| * | CP Name: | VCHRGD Seven |
| Meste | Authorizatio | n Key: |
| | Output Curre | ent: 32 |
| | Charge Mod | e: APP |
| | Power Distri | buti APP |
| | Sampling Me | RFID only ethc Plug and Charge |
| | Home Power | Current: 80 |
| | Power Meter | Address: 1 |

Installer App User Guide

Getting started.

The VCHRGD installer commissioning mobile app is a tool designed to enable charge point installers to quickly and easily set-up the VCHRGD Seven.

Connecting to the charger via Bluetooth, it allows installers to input WiFi credentials, set charge modes, set and change charger passwords define

maximum output current & configure load management.

Download.

Download and install the App from the Google Play or Apple store. Search VCHRGD Installer or VCHRGD. To find the app.



Bluetooth Devic

CHRGD Installer" Wo like to Use Bluetooth GETITON Google Play



Install.

Find and tap the VCHRGD Installer Icon on your mobile phone or tablet. When prompted, enable Bluetooth or location permissions (required for Bluetooth scanning).



Open VCHRGD Installer, and the available Bluetooth device list page appears, you should see your charger here.

NOTE: If the connection attempt times out before connecting, wait and select the charger again once visible.

Enter Password.

- 1. Select your charger from the list of devices
- 2. Enter the password from the install kit
- 3. Tap **OK** to connect

Bluetooth Device

ES00454

ES10001

3C3B58F5E42E30A8EA D8J214106837

3C3B58F5EA2A30A8EA

DeskJet 4100 series

bDW (DALI/BC/Dim) bDW (DALI/BC/Dim) bDW (DALI/BC/Dim)

OCTO Indoor Surface PIR Sensor

Select configuration type

Full configuration

Cancel

If you have lost the installer password then please call VCHRGD technical support and quote the **Magic No.** for a temporary password.



ES00000 - APP ID: XXXX PIN:XXX Installer Password: XXXXXXX

Select Mode.

The installer app will now give you the option of **Simple** or **Full Configuration**.

Simple configuration allows you to connect the charger to WiFi and select the charge mode only.

Full configuration will allow to you access to all configuration settings, including load management & back-end settings.



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Connectivity.

Select customer WiFi from the area scan list.

Once selected, enter the WiFi password into the field below.

Please note password is case sensitive



| 14:54 | | ul ≎ 🕫 |
|----------------|----------------------------|--------|
| | | |
| WIFI SSID: | BTB-JWCGCT | |
| WiFi connectio | BTB-JWCGCT BTWi-fi | |
| WiFi Passwo | FLUR0001 | |
| 4G APN: | PLUSNET-8JQM BTB-FJCG2M | |
| 4G Account: | Max length: 32 characters | |
| 4G Password | Max length: 32 characters | ø |
| Server URL: | Secure | • |
| CP Name: | ES10001 | |
| Authorization | Key: | Ø |
| Output Curren | nt: 32 | |
| Charge Mode | : APP | • |
| Power Distrib | ution Enable: | 0 |
| Sampling Met | hod: CT | • |
| Home Power | Current: 100 | |
| Power Meter | Address: 1 | |
| | Set Get | |
| | | _ |

Charge Mode.

Configure the output current for the charger, **32A** is the default.

Select the charge mode from the drop-down list

- App Full mobile app control
- RFID Only Tap & Charge only
- Plug & Charge Plug in & charge

Load Management.

Set the Power Distribution Enable to ON (switch green), and set the home power current accordingly. Sampling method on **CT** and Power meter Address at **1**.

Use these settings if CT clamp connected.



Comission.

If **Plug & Charge** or **RFID only** are being used, set **server URL** field to '**blank**'

Please note that the VCHRGD Seven can operate in RFID only and Plug & Charge by configuring them in the VCHRGD Home App. By setting a blank server URL the customers charger will not be connected to the VCHRGD Secure back-end. We do not recommend setting the charger to anything but **App** mode unless connectivity is unavailable.

Confirm.



| Bluetooth | Devices |
|-----------------------|------------|
| DeskJet 4100 series | |
| ES10001 | Disconnect |
| 3C3B58F5E42E30A8EA | 4 |
| ES00454 | |
| 3C3B58F5EA2A30A8E | A |
| bDW (DALI/BC/Dim) | |
| 3C3B58F5CBE430A8E | A |
| D8J214106837 | |
| OCTO Indoor Surface P | IR Sensor |
| bDW (DALI/BC/Dim) | |
| bDW (DALI/BC/Dim) | |
| OCTO Indoor Surface P | IR Sensor |
| bDW (DALI/BC/Dim) | |
| | |

After modifying the page parameter information, click the SET button to send it to the charging point.

You will then see Set Successfully

Tap the **< Back** button in the top left hand corner of the app.

You will return to the **Bluetooth Devices** screen, here you should see **Disconnect** next to the charger ID. Tap this to disconnect and complete the commissioning process.

Once complete the charger will reboot, flash blue and beep.





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Introduction.

This manual, and the functions described in it, are valid for the installation of VCHRGD Technologies domestic, tethered and socketed, 7kW AC chargers.

This manual is designed exclusively for trained, qualified personnel. These are people who, due to their training, skills and experience, and knowledge of the relevant standards, can assess the work assigned to them and identify possible dangers.

The illustrations and explanations contained in this manual refer to a typical version of the device.

Your device version should not, but may differ from this.

Please refer to the manual for information and instructions for operating the device.





Introduction.

Product Appearance.

Untethered.

Tethered.





Charge Session History



Solar Integration



Dynamic Load Control



Tap & Charge



Smart Scheduling Integration



VCHRGD TECHNOLOGIES LTD 2023

Specifications.

| | Charger Specification |
|--------------------------------|--|
| Charger Version | Type 2 Tethered of Untethered |
| Installation Method | Wall mounted, Column or pole (optional) |
| Rated Power Output | 7kW |
| Charging Mode/s | Plug & Charge / RFID Only or APP + RFID |
| Dimensions (H/W/D) | 340 x 200 x 129mm |
| Net Weight | 4.5kg |
| Charging Standard/s | IEC61851, IEC62196 |
| | Electrical Specification |
| Input Voltage | Single-phase AC230V 50/60Hz(L1+N+PE) |
| Input Current | 0 - 32A |
| Leakage Protection | Type B RCD AC 30mA +DC 6mA |
| Output Voltage | 230VAC+/-10% |
| Output Current | Adjustable Charge Current (6-32A) |
| Standby Power | <2.5W |
| Connector/Cables | Cable w./ Type 2 Connector or Type 2 Socket |
| Cable Length | Standard 5m (for tethered version) |
| Status Indication | LED status light |
| Ingress Protection Level | IP55 |
| Operating Temperature Range | -30°C -to 55°C |
| Operating Humidity Range | 5% to 95% |
| Operating Altitude | ≤ 2000m |
| Operating Lifetime (Cycles) | ≥ 10000 |
| Safety Features | PEN Fault Detection (O-PEN) Over & Under Voltage Protection Over Temperature Protection Earth Leakage Protection Lightning Protection Unconnected PE Ground Protection Welding Detection Manual Mechanical Override |



Introduction.

Specifications.

| | | Blue & White or Black ABS Casing |
|----------------------------|-------------------------|--|
| | | Type B RCD AC 30mA + DC 6mA |
| Non-Smart Functionality | RFID & Plug & Charge | Contactor |
| | | Side Emergency Stop/Start Button |
| | | LED Status Indication |
| | | WiFi + Bluetooth |
| | | Smart Home Load Monitoring & |
| | | Management |
| | | Set authorised or unathorised charging |
| Smart | App Control | Start/Stop Charge, Charging Records |
| Functionality | | Smart Charging/ Charge Scheduling |
| | | Off-Peak Charging |
| | | Register RFID cards |
| | | Adjustable Charge Current (6- 32A) |

For more detailed specifications please see the VCHRGD Seven Datasheet.

You can also access all documents pertaining to EVSCP Compliance as an approved installer, either by request, through <u>www.VCHRGD.com</u> or they will have been sent to you on purchase of the VCHRGD Seven. End users can access the Statement of Compliance and Technical File

via the VCHRGD Home app main menu.



Introduction.

Packaging.



Install Kit.

Screws & Wall plugs for affixing bracket

Insulated crimp terminals for incoming power



CT Clamp for smart home & solar compatibility

Quality Control Sticker



Introduction.

a) This electrical device should be installed, operated, serviced, and maintained only by qualified personnel. No responsibility is assumed by the manufacturer for any consequences arising out of the use of this device. A qualified person is one who has skills and knowledge related to the construction, installation and operation of electrical device and who has received safety training to recognise and avoid the hazards involved.

b) All applicable local, regional, and national regulations must be respected when installing, repairing, and maintaining this device.



An additional small flat head screwdriver will be required for adjusting the CT terminals. And a Phillips head screwdriver for the mounting bracket & power line access.



Protection.



Safety precautions for installation: The charger has integral RCD protection rated at (AC 30mA & DC 6mA).

It is necessary to install a **40A or 63A RCBO** in line before the charger, for multi-level safety protection.

Since 27TH SEPTEMBER 2022, THE NEW 18TH EDITION AMENDMENT 2 OF THE WIRING REGULATIONS CAME INTO EFFECT. WITH THESE NEW REGULATIONS, ALL NEW ELECTRICAL CIRCUITS MUST HAVE SURGE PROTECTION DEVICES (SPDS) FITTED. SOME INSTALLERS MAY CHOOSE TO ENTER INTO AN OPT OUT AGREEMENT WITH THE CUSTOMER, HOWEVER THIS IS THE SOLE RESPONSIBILITY OF THE INSTALLER TO AGREE WITH THE END USER PRIOR TO INSTALLATION.



Bracket Mounting.

1 Identify mounting point, hold bracket flush to surface, and level. Mark wall at fixing points highlighted below ★).

2 Drill holes (6mm diameter) into wall at marked points, & push wall plugs into place.



NOTE:

As the power line is fed into the charger from the bottom of the case, please leave sufficient clearance from the mounting point to the desired termination point for the cable run.



Wiring.



Incoming Power Line Case internals are labelled accordingly

L - Live (brown) N - Neutral (blue) PE - Earth (green & yellow)



Energy Management Line Case internals are labelled accordingly

1 - To S1 of CT Clamp (white)2 - To S2 od CT Clamp (black)

You can use 4 or 6mm SWA or NYY cable depending on your preference and the installation requirements. If DLM is being implemented, and the CT requires extension. Then we recommend EV Cable that integrates a shielded twisted pair.

As the charger does not require the SWA armouring to be used as a CPC, it is not necessary to use an earthing tag at the charger, only at the consumer unit.

NOTE:

If extending the CT clamp for dynamic load management and solar functions, please use a twisted pair connection such as CAT5E or a suitable EV cable. Match the polarity of the CT accordingly, ensuring that the coloured and white connections of the twisted pair correspond. to S1 and S2, and terminate accordingly.



Wiring.



| Number | 1 | 2 | 3 | 4 |
|------------|-------------|--------------|------------|------------|
| Definition | CT + | CT- | RS485A | RS485B |
| Туре | CT (Current | Transformer) | Meter (Por | wer meter) |
| Wiring | | | | |



Solar & DLM.



Step 2 Detect & Adjust

A 80A > I_{CT} > 6A , Prioritise the use of household loads, even if the PV has current, it is used by $I_{\rm H}$

 $I_{\rm CT}$ is from the grid to the home, and is greater than 6A, the charger always maintains 6A output

B $I_{CT} = 80A$, The charger always has a minimum 6A output.

C $I_{CT} = 4A$, So $I_{PV} > I_{H} + 2A$, At this time, I_{C} increases 2A, So I_{CT} will remain at 6 A. As Ipv keeps increasing, I_{C} will continue to increase in 2A increments.

Solar charging power = $(I_C - I_{CT}) \times V \times T$

D $I_{CT} < 0A$, The I_{PV} is high, and the charger I_C continues to output at full power.

Solar charging power = $I_C \times V \times T$



CT Connection.

This is the **primary and preferred method** for dynamic load management installations. Extend CT clamp cable using a twisted pair, such as CAT5E.



Meter Connection.



The VCHRGD installer commissioning mobile app is a tool designed to enable charge point installers to quickly and easily set-up the VCHRGD Seven.

Connecting to the charger via Bluetooth, it allows installers to input WiFi credentials, set charge modes, set and change charger passwords define

maximum output current & configure load management.

Download.

Download and install the App from the Google Play or Apple store. Search VCHRGD Installer or VCHRGD. To find the app.



Bluetooth Devic

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Install.

Find and tap the VCHRGD Installer Icon on your mobile phone or tablet. When prompted, enable Bluetooth or location permissions (required for Bluetooth scanning).



Open VCHRGD Installer, and the available Bluetooth device list page appears, you should see your charger here.

NOTE: If the connection attempt times out before connecting, wait and select the charger again once visible.

Enter Password.

- 1. Select your charger from the list of devices
- 2. Enter the password from the install kit
- 3. Tap **OK** to connect

Bluetooth Device

ES00454

ES10001

3C3B58F5E42E30A8EA D8J214106837

3C3B58F5EA2A30A8EA

DeskJet 4100 series

bDW (DALI/BC/Dim) bDW (DALI/BC/Dim) bDW (DALI/BC/Dim)

OCTO Indoor Surface PIR Sensor

Select configuration type

Full configuration

Cancel

If you have lost the installer password then please call VCHRGD technical support and quote the **Magic No.** for a temporary password.



ES00000 - APP ID: XXXX PIN:XXX Installer Password: XXXXXXX

Select Mode.

The installer app will now give you the option of **Simple** or **Full Configuration**.

Simple configuration allows you to connect the charger to WiFi and select the charge mode only.

Full configuration will allow to you access to all configuration settings, including load management & back-end settings.



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Connectivity.

Select customer WiFi from the area scan list.

Once selected, enter the WiFi password into the field below.

Please note password is case sensitive



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| | | |
| WIFI SSID: | BTB-JWCGCT | |
| WiFi connectio | BTB-JWCGCT BTWi-fi | |
| WiFi Passwo | FLUR0001 | |
| 4G APN: | PLUSNET-8JQM BTB-FJCG2M | |
| 4G Account: | Max length: 32 characters | |
| 4G Password | Max length: 32 characters | ø |
| Server URL: | Secure | • |
| CP Name: | ES10001 | |
| Authorization | Key: | Ø |
| Output Curren | nt: 32 | |
| Charge Mode | : APP | • |
| Power Distrib | ution Enable: | 0 |
| Sampling Met | hod: CT | • |
| Home Power | Current: 100 | |
| Power Meter | Address: 1 | |
| | Set Get | |
| | | _ |

Charge Mode.

Configure the output current for the charger, **32A** is the default.

Select the charge mode from the drop-down list

- App Full mobile app control
- RFID Only Tap & Charge only
- Plug & Charge Plug in & charge

Load Management.

Set the Power Distribution Enable to ON (switch green), and set the home power current accordingly. Sampling method on **CT** and Power meter Address at **1**.

Use these settings if CT clamp connected.



Comission.

If **Plug & Charge** or **RFID only** are being used, set **server URL** field to '**blank**'

Please note that the VCHRGD Seven can operate in RFID only and Plug & Charge by configuring them in the VCHRGD Home App. By setting a blank server URL the customers charger will not be connected to the VCHRGD Secure back-end. We do not recommend setting the charger to anything but **App** mode unless connectivity is unavailable.

Confirm.



| Bluetooth | Devices |
|-----------------------|------------|
| DeskJet 4100 series | |
| ES10001 | Disconnect |
| 3C3B58F5E42E30A8EA | 4 |
| ES00454 | |
| 3C3B58F5EA2A30A8E | A |
| bDW (DALI/BC/Dim) | |
| 3C3B58F5CBE430A8E | A |
| D8J214106837 | |
| OCTO Indoor Surface P | IR Sensor |
| bDW (DALI/BC/Dim) | |
| bDW (DALI/BC/Dim) | |
| OCTO Indoor Surface P | IR Sensor |
| bDW (DALI/BC/Dim) | |
| | |

After modifying the page parameter information, click the SET button to send it to the charging point.

You will then see Set Successfully

Tap the **< Back** button in the top left hand corner of the app.

You will return to the **Bluetooth Devices** screen, here you should see **Disconnect** next to the charger ID. Tap this to disconnect and complete the commissioning process.

Once complete the charger will reboot, flash blue and beep.



Home App

At VCHRGD we think EV charging should be easy, and the VCHRGD Home App is designed to give you complete control over your charging, at home or on the go. The VCHRGD Home app is free to download and free to use. Complete with a comprehensive set of features allowing you to: schedule, authorise, monitor and track your charge sessions over time.

Download.

Download and install the App from the Google Play or Apple store. Search VCHRGD Installer or VCHRGD. To find the app.









Install.

Find and tap the VCHRGD Installer Icon on your mobile phone or tablet. When prompted, enable app permissions including location & camera access to make the most of the VCHRGD Home app.



Sign Up.

'Sign Up' and Тар enter your email and password into the appropriate fields. Tap 'Terms of Service & privacy Policy', to read. When you're happy to proceed, select 'I have read and I agree to the Terms of Service and the Privacy Policy' and tap 'Next'





| × | Contact Detail | s |
|----------------|---------------------|----------|
| All of the fol | lowing fields are o | ptional. |
| First Name | | |
| Last Name | | |
| Phone | | |
| | | |
| United Kingdo | om | |
| | | |
| Postal Code | | |
| Address | | |
| | | |
| | 🕅 Submit | |

Enter **your contact details** into the text fields, and tap submit once complete. This section is optional, however it does help us to identify you, in the event that you require support.

Once complete please tap '**Submit**' to move on to adding your charger.

Please note that you must have an account in order to add a charger.

As per the terms and conditions of our Terms of Service and Privacy Policy, your personal data is protected and secured and will not be shared with any third parties.



Connect your charger.

The next step is to connect to your VCHRGD Seven charger, to successfully connect you'll require the 4-Digit ID and PIN provided with your charger. Once you have these to hand, you're ready to connect and set up your VCHRGD Seven

connect and set-up your VCHRGD Seven.

Once you've signed up, the Add Home Charger screen will appear.

Tap the 'Scan QR Code' button at the bottom of the page, this will open up another page with your camera output displayed in the centre of the screen.

At the bottom of this screen tap the 'Enter ID Manually' button





When prompted, enter the 4-Digit Charger ID. Once you have entered your ID, tap the 'Enter' button.

When prompted, enter your 4-Digit PIN. Once you've entered this successfully, the 'Home Charger Added' screen will appear.

You have now connected to your VCHRGD Seven

Note Your ID and PIN are provided on a label in the box, with your charger. In the event that you misplace your ID and PIN, you can always contact us at VCHRGD Technologies to recover them.



Start Charging.

Once you've configured your smart charging schedule, you're ready to plug your car in and start charging.

Once the car is plugged in, the you will see the charger image on the Home Charge screen change to 'Tap to Confirm Charge'. If smart charging is enabled then tapping this icon will commence your charging schedule. If Smart charging is disabled, then this will commence a full power charge.

14:20

7.0 kW

3.5 kW

Session Summary

Charging complete!

Close

C Unlock Connector

00:00 h

 (\mathbf{x})



Note Once you connect your car to the charger, the LED on the charger will change from solid blue, to flashing green. This indicates that the charger is ready, once you authorise the charge this will change to solid green, and you will hear the cable lock engage.

The charge schedule is visualised on a graph (as shown above), the high points indicate when the car will be charging at full-power and the low-points are the keep awake mode power output. Timings are indicated at the bottom of the graph and match the schedule that you've set.

Tapping 'Boost Charge' will increase the charge power to the full 7.4kW, and 'Stop Now' will stop it.

> With the addition of the cable lock feature, you will now also see the option to unlock your connector at the end of a session.

> This prevents users from accidently laving the cable lock engaged if they wish to remove the charging cable from the charger. If you wish to leave the cable locked then you can simply close the charging session.

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Stop Charging.

Once a charge session has completed, or if you select the '**Stop Now**' option on your charge screen, the charger will disconnect but **remain locked** (to ensure that your cable is safe if using an untethered unit.

Once the charge session is complete, you will be presented with a 'Session Summary' screen. This contains the details of the session, such as the schedule that was followed, the average **power** delivered, the **energy** delivered, and the **duration** of the charging session.

20:25

7.0 kW

3.5 kW

19:48

=4

ES10001

0.72 kWh

N

뿺

53

04:30

Duration

00:38 h

 (\mathbf{x})

Stop Nov



Note When a charge session ends, the cable remains locked in order to prevent anyone other than the owner from disconnecting the cable. In order to disconnect the cable, unlock your vehicle, you will hear the cable lock disconnect and can now safely remove the cable from the charger and car.

Solar & DLM.

Solar charging and dynamic load management are **automatic** features of the charger. If installed with the **CT clamp** provided. The charger will monitor the home load and increase your scheduled charge, if load is low, to solar charge. Or decrease the charge power to protect the main fuse, if load is high. This is a **low cost** form of solar integration & DLM but we are working on even more **advanced integrations**.

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RFID Only.

Step 1 - Plug in the Connector

For **untethered** units, lift the protective cap covering the socket, and connect your vehicle charging cable to the vehicle and the charger.

For **tethered** units, press the button to release the Type 2 connector from the dummy socket, unravel the cable and connect to your vehicle charge socket.

Step 2 - Tap VCHRGD Card

Tap or swipe your VCHRGD card over the V logo on your charger.

Wait for the beep to confirm that the card has been successfully read.

Step 3 - Charge

Once the card has been successfully read by the charger, the LED on the front panel will turn solid green to indicate that it is charging.



Please note that RFID only mode can be emulated when the charger is connected to the back-end, you simply need to approve charging sessions using the provided Tap & Charge cards rather than with the app, as per the VCHRGD Home user guide.



Plug & Charge.

Step 1 - Plug in the Connector

For **untethered** units, lift the protective cap covering the socket, and connect your vehicle charging cable to the vehicle and the charger.

For **tethered** units, press the button to release the Type 2 connector from the dummy socket, unravel the cable and connect to your vehicle charge socket.

Step 2 - Charge your vehicle

Charging should commence automatically start charging. If you need to stop charging use the manual start/stop button to start and stop charging on demand.



Please note that plug & charge mode can be emulated when the charger is connected to the back-end, you simply need to remove the authentication requirement for charging sessions, as per the VCHRGD Home user guide.



After Sales.

Fault Indication.

| LED Status | Status Description | Resolution |
|--------------------------------|---|--|
| All lights off / No LED status | Power down | Check L1/L2/L3/N/PE wiring |
| Blue light on | Power on standby | Normal |
| Flashing green | Car connected, pending charge authorisation | Normal |
| Green light on | Car charging | Normal |
| | LED Status Red | |
| Flash 1 time | Fault, RCD leakage protection, or PE has current | Disconnect charge connector and wait for the fault to be eliminated |
| Flash 2 times | Fault, Overcurrent Fault | Disconnect charge connector and wait for the fault to be eliminated |
| Flash 3 times | Fault, Ground (PE) Disconnect Fault | Check incoming power line, to see if PE is connected |
| Flash 4 times | Fault, Overvoltage | Check incoming power line, to see if L and N are connected incorrectly |
| Flash 5 times | Fault, Contactor Welded Fault | Check if contactor control line is loose, or the contactor is damaged, replace the contactor . |
| Flash 6 times | Fault, Emergency stop press, or emergency stop is broken | Check if the red emergency stop button on the side is pressed |
| Flash 7 times | | |
| Flash 8 times | Fault, Under voltage | Check if the incoming line is loose |
| Flash 9 times | Fault, Over temperature | Stop charging and wait for normal temperature |

Recycling.

The box that the VCHRGD Seven is shipped in can be recycled or reused. Please ensure you separate all plastic packaging used prior to recycling the carboard.

Bag recycling.

The packaging bag and any plastics used are also 100% recyclable in accordance with your local authority.



After Sales.

Thank you for choosing the VCHRGD Seven as your charging solution.

In order to ensure that the VCHRGD Seven performs to the very best of its ability, correct installation, configuration, use and maintenance are essential.

Please ensure that installation & configuration are in strict accordance with the requirements set out in the "VCHRGD Seven User Manual" and that installation is suitably documented.

Post-installation please ensure that the charger is not operated outside of the conditions specified in the "VCHRGD Home App User Guide" or "VCHRGD Seven User Manual".

Office Hours

Monday to Friday, 8:30 - 17:00PM (except national and public holidays)

Contact Information

Telephone: +44 1494 370523 Email: info@vchrgd.co.uk Website: https://vchrgd.com Address: Unit 1a Eghams Court, Bourne End, High Wycombe, SL8 5YS, UK



After Sales.

Warranty.

The charger is guaranteed for 3 years and the warranty cover is active within 3 years of installation.

For issues caused by the charger itself, including faulty operation or limited functionality. On-site assistance, repair and replacement will be provided free of charge to the end user.

The warranty for problems caused by the charger itself, or derived from faulty product covers; spare parts and VCHRGD Seven replacement, as well as the corresponding maintenance & labour costs;

Damage inflicted to the charger or home as a result of accidental damage, natural disasters, misuse, or improper installation is not covered by the warranty.

For warranty, claims, please fill in the warranty form and describe the cause of the problem in detail. It is best to provide a photo or video with your warranty claim, so that our service staff can quickly locate the cause of the problem, and work to find a resolution.

The warranty form can be found below:

VChrgd Seven Warranty Form Link



Rchngd



Getting started.

At VCHRGD we think EV charging should be easy, and the VCHRGD Home App is designed to give you complete control over your charging, at home or on the go. The VCHRGD Home app is free to download and free to use. Complete with a comprehensive set of features allowing you to: schedule, authorise, monitor and track your charge sessions over time.

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| × | Contact D | etails | |
|-----------------|----------------|--------------|--|
| All of the foll | owing fields a | re optional. | |
| First Name | | | |
| Last Name | | | |
| Phone | | | |
| United Kingdo | im | | |
| City | | | |
| Postal Code | | | |
| Address | | | |
| | | | |

Enter **your contact details** into the text fields, and tap submit once complete. This section is optional, however it does help us to identify you, in the event that you require support.

Once complete please tap '**Submit**' to move on to adding your charger.

Please note that you must have an account in order to add a charger.

As per the terms and conditions of our Terms of Service and Privacy Policy, your personal data is protected and secured and will not be shared with any third parties.



Connect your charger.

The next step is to connect to your VCHRGD Seven charger, to successfully connect you'll require the 4-Digit ID and PIN provided with your charger. Once you have these to hand, you're ready to connect and set up your VCHRGD Seven

connect and set-up your VCHRGD Seven.

Once you've signed up, the Add Home Charger screen will appear.

Tap the 'Scan QR Code' button at the bottom of the page, this will open up another page with your camera output displayed in the centre of the screen.

At the bottom of this screen tap the 'Enter ID Manually' button





When prompted, enter the 4-Digit Charger ID. Once you have entered your ID, tap the 'Enter' button.

When prompted, enter your 4-Digit PIN. Once you've entered this successfully, the 'Home Charger Added' screen will appear.

You have now connected to your VCHRGD Seven

Note Your ID and PIN are provided on a label in the box, with your charger. In the event that you misplace your ID and PIN, you can always contact us at VCHRGD Technologies to recover them.



The next step is to configure your VCHRGD Seven, from the 'Configuration' page you are able to customise the home page for your charger, set charging schedules, toggle security features and optimise your charger performance.

Now that you're connected to your VCHRGD Seven you can configure and customise it to meet your needs.

Tap the **configure** button, this will open the configuration screen, this can also be accessed by tapping the '**cog**' icon in the top right hand side of your home screen.

From this page you can use the customisation features to **personalise** your home screen, set your smart charging **schedule** and **optimise** your charge settings.





By selecting the '**Name**' option, you can change the name that appears above your charge on the home charging screen.

By selecting '**Location**' you can set the exact location of your home charger.

By selecting '**Photo**' you can set the image that appears on your home charging screen. This could be a picture of your home charger on site, or anything you want it to be.



Authentication.

Your VCHRGD Seven will arrive configured to allow charging without requiring **Authentication**. This means that you can plug-in and charge, without approving the charge session on your app.

We recommend that you change this setting to '**Required**' by selecting the drop-down menu and tapping 'Required' then 'Save Changes'. This means that your charger will now require you to approve charge sessions via the app, or using the **VCHRGD cards** provided.



Note The VCHRGD Card authentication will also work once your Authentication mode is set to 'Required'. Giving you a high level of flexibility when it comes to charging modes.

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Scheduling.

By selecting '**Smart Charging**' and selecting '**Scheduled**', you can configure your charging schedules.

This feature is to allow you to charge only when it suits you. Enter the times for your day and night energy tariff rates (these are set by your energy provider). You can also enter your electricity rates for your day and night tariff, to all the VCHRGD App to calculate the cost of your charging sessions

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Octopus Go.

The Octopus Go Tariff is designed for EV drivers who want to charge at home during the night when energy is **cheapest**. Simply enter your postcode if you haven't already, and the VHCRGD Home app will align with your tariff, including **tracking the cost** of charging sessions.

Once you've done this, you will still be able to set a **target charge**. This is to ensure that if your vehicle always takes as much charge as you need it to.





Agile Octopus.

With Agile Octopus, you get access to half-hourly energy prices, tied to **wholesale prices** and updated daily. So when wholesale electricity prices drop, so do your bills - and if you can shift your daily electricity use outside of peak times, you can **save even more**.

The VCHRGD Home app tracks your daily tariff by postcode, you can set an upper 'price threshold' so that you only charge when you're paying the prices you want to pay

Note The 'Set target charge' option can be used to define how much charge you want to deliver within the set time. If the desired target charge set here cannot be achieved within the scheduled time frame, then the charger will adapt the schedule, and increase power output to ensure that it is met. Additionally you can set a departure time, to ensure that you have the charge you need, when you need it



Cable Lock.

The untethered VCHRGD Seven has the ability to lock your charging cable into place, even when you're not charging.

Turning your **untethered** charger **into** a **tethered** one, at the touch of a button. Through the configuration page, tap the **'Connector Lock'** option.

Here you can dynamically lock the connector by tapping 'Lock Cable to Connector' and saving changes.





Security Log.

As part of the EVSCP Smart Charging Regulations brought in by the UK government in 2022. All chargers sold since 31st December 2022 require a **tamper detection** sensor to be built in.

They also require the charger to notify users of any attempted tamper event.

You can access the **security log** of tamper events by tapping the ③ icon and selecting 'Security Events'.

Note The EVSCP regulations also state that all chargers must come preconfigured with off -peak charging. The VCHRGD Seven is programmed to charge between 22:00 - 06:00 and can be changed or opted out of at first use.

All domestic chargers are also required to apply a 0 -600 second randomised delay to the start of every charging session, this will be applied automatically by the VCHRGD Seven.

Firmware updates (if available) can be selected and pushed to the charger by the home user, this can be managed through the 'Firmware Update' menu.



Start Charging.

Once you've configured your smart charging schedule, you're ready to plug your car in and start charging.

Once the car is plugged in, the you will see the charger image on the Home Charge screen change to 'Tap to Confirm Charge'. If smart charging is enabled then tapping this icon will commence your charging schedule. If Smart charging is disabled, then this will commence a full power charge.

14:20

7.0 kW

3.5 kW

Session Summary

Charging complete!

Close

C Unlock Connector

00:00 h

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Note Once you connect your car to the charger, the LED on the charger will change from solid blue, to flashing green. This indicates that the charger is ready, once you authorise the charge this will change to solid green, and you will hear the cable lock engage.

The charge schedule is visualised on a graph (as shown above), the high points indicate when the car will be charging at full-power and the low-points are the keep awake mode power output. Timings are indicated at the bottom of the graph and match the schedule that you've set.

Tapping 'Boost Charge' will increase the charge power to the full 7.4kW, and 'Stop Now' will stop it.

> With the addition of the cable lock feature, you will now also see the option to unlock your connector at the end of a session.

> This prevents users from accidently laving the cable lock engaged if they wish to remove the charging cable from the charger. If you wish to leave the cable locked then you can simply close the charging session.

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Stop Charging.

Once a charge session has completed, or if you select the '**Stop Now**' option on your charge screen, the charger will disconnect but **remain locked** (to ensure that your cable is safe if using an untethered unit.

Once the charge session is complete, you will be presented with a 'Session Summary' screen. This contains the details of the session, such as the schedule that was followed, the average **power** delivered, the **energy** delivered, and the **duration** of the charging session.

20:25

7.0 kW

3.5 kW

19:48

=4

ES10001

0.72 kWh

N

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53

04:30

Duration

00:38 h

 (\mathbf{x})

Stop Nov



Note When a charge session ends, the cable remains locked in order to prevent anyone other than the owner from disconnecting the cable. In order to disconnect the cable, unlock your vehicle, you will hear the cable lock disconnect and can now safely remove the cable from the charger and car.

Solar & DLM.

Solar charging and dynamic load management are **automatic** features of the charger. If installed with the **CT clamp** provided. The charger will monitor the home load and increase your scheduled charge, if load is low, to solar charge. Or decrease the charge power to protect the main fuse, if load is high. This is a **low cost** form of solar integration & DLM but we are working on even more **advanced integrations**.

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Other Features.

Charging History.

By selecting the 'Charging History' option from the Menu, you can view previous charging sessions.

The date range is configurable but set at a default value of '30 days', to adjust this range tap the drop down and select the date range that suits you.

Tap the session you would like to view in more detail, and it will open the 'Session Summary' for that charging session.



Live Chat.

Our in app Live Chat feature puts our technical expertise right at your fingertips. Simply navigate to the Live Chat page in the main menu, enter your charger ID and a brief description of your question, and one of our technical team will be right there to support you.

Ensure that you keep your Live Chat open until your enquiry has been responded to. If we miss you over the weekend or bank holidays then one of the team will call you back as soon as they are available.





Connect to WiFi.

The VCHRGD installer commissioning mobile app is a tool designed to enable charge point installers to quickly and easily set-up the VCHRGD Seven.

Connecting to the charger via Bluetooth, it allows installers to input WiFi credentials, set charge modes, set and change charger passwords define

maximum output current & configure load management.

Download.

Download and install the App from the Google Play or Apple store. Search VCHRGD Installer or VCHRGD to find the app.



Bluetooth Devic

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Install.

Find and tap the VCHRGD Installer Icon on your mobile phone or tablet. When prompted, enable Bluetooth or location permissions (required for Bluetooth scanning).



Open VCHRGD Installer, and the available Bluetooth device list page appears, you should see your charger here.

NOTE: If the connection attempt times out before connecting, wait and select the charger again once visible.

Enter Password.

- 1. Select your charger from the list of devices
- 2. Enter the password from the install kit
- 3. Tap **OK** to connect

If you have lost the installer password then please call VCHRGD technical support and quote the **Magic No.** for a temporary password.



ES00000 - APP ID: XXXX PIN:XXX Installer Password: XXXXXXX

Bluetooth Devices

ES00454

D8J214106837 ES10001

3C3B58F5E42E30A8EA

3C3B58F5EA2A30A8EA DeskJet 4100 series

bDW (DALI/BC/Dim)

bDW (DALI/BC/Dim) bDW (DALI/BC/Dim)

OCTO Indoor Surface PIR Sensor

Simple configuration

Full configuration

Cancel



Technical Support

+44 (0)1494 370524

Select Mode.

The installer app will now give you the option of **Simple** or **Full Configuration**.

Simple configuration allows you to connect the charger to WiFi and select the charge mode only.

Select **Simple Configuration** mode and then follow the instructions on the next page to set or change the WiFi details for your charger.



Connectivity.

Select your WiFi from the area scan list. Please note that this is a **list of WiFi networks** that the charger can see. If your WiFi isn't on this list then you may require a WiFi booster to ensure connection at your charger site.

The VCHRGD seven operates on a **2.4GHz** WiFi band, for some dual band routers you may need to temporarily disable 5GHz connections to connect the unit.





Enter Password.

Once you have successfully found and **selected your WiFi** from the dropdown list, you will need to enter your **WiFi password**.

Please note that this is **case sensitive**, and in 9/10 cases if the charger doesn't connect, it is due to a typo in the WiFi password, so please doublecheck before moving on.



Confirm.



After modifying the page parameter information, click the SET button to send it to the charging point.

You will then see Set Successfully

Tap the **< Back** button in the top left hand corner of the app.

You will return to the **Bluetooth Devices** screen, here you should see **Disconnect** next to the charger ID. Tap this to disconnect and complete the commissioning process.

Once complete the charger will reboot, flash blue and beep.

Thank you for choosing VCHRGD as your smart charging provider. If you ever require any support with your home or workplace charging, we are available through the Live Chat feature in the app, or you can contact us on the number below.



Technical Support +44 (0)1494 370524

