Document Number: EDS 08-5050

Version: 6.0

Date: 03/07/2025

ENGINEERING DESIGN STANDARD

EDS 08-5050

ELECTRIC VEHICLE CONNECTIONS

Network(s): EPN, LPN, SPN

Summary: This standard provides guidance on the requirements for the connection of electric vehicle charge point (EVCP) equipment and includes the notification process.

Author: John Mason **Date:** 03/07/2025

Approver: Paul Williams **Date:** 08/07/2025

Applicable To:

UK Power Networks

☒	Asset Management	☐	Information Systems
☐	Capital Programme	☐	Innovation
☒	Connections	☐	Legal
☐	Customer Services	☒	Network Operations
☐	DSO	☐	Procurement
☐	Finance / Income Management	☐	Strategy & Regulation
☐	Health & Safety	☐	Technical Training

External

☒	G81 Website	☒	Contractors
☒	ICPs/IDNOs	☐	Meter Operators

Revision Record

Version	6.0	**Review Date**	03/07/2030
Date	03/07/2025	**Author**	John Mason

Reason for update: Business feedback and the introduction of phase-neutral loop impedance for unmetered EVCP connections.

What has changed:

- Document summary, introduction, and scope amended.
- Document re-structured and some content (including Diversity Guidance) removed.
- Section 3 updated.
- Section 4 revised to clarify the EVCP connection process (Figure 4-1).
- Section 5 amended to align with new document structure (Table 5-1).
- Section 6.1 includes maximum phase-neutral loop impedance for UMS connections (Table 6-1).
- Section 6.2 revised to clarify the use of pup fuses and service upgrade requirements.
- Section 7.3 revised to require a minimum separation of 2.5m from all other earthing systems.
- Section 10 updated to align the mandatory notification with current processes.
- Appendix B added to list all assessed open PEN detection devices (OPDDs).
- Appendix C reference to the service termination guide updated.
- Document reviewed.

Version	5.1	**Review Date**	23/04/2029
Date	11/12/2024	**Author**	John Mason

Reason for update: Minor update following feedback from the business.

What has changed:

- Section 2 revised to clarify that Vehicle to Load (V2L) is not within the scope of this standard.
- Section 3 PQM removed and V2L definition added.
- Section 4.1 EVCP connection flowchart corrected (Figure 4-1).
- Section 6.4 reference to EOS 03-0072 corrected to ECS 13-0072.
- Section 7.5.2 amended to clarify earthing arrangements in the public highway.
- Section 7.5.3 amended to clarify earthing arrangements at existing buildings.

Version	5.0	**Review Date**	23/04/2029
Date	23/04/2024	**Author**	John Mason

Reason for update: Unmetered supplies updated.

What has changed:

- Section 1 amended to include guidance on BS 7671.
- Section 2 amended to include references to connection standards.
- Section 3 definitions updated.
- Section 4.1, Figure 4-1 added to replace existing flowchart.
- Section 5, Table 5-1 amended to align with the latest updates to connection standards.
- Section 6.1 UMS service alterations can now be requested from an approved ICP.
- Section 6.1, ‘Minimum Cable Size’ replaced with ‘Maximum Earth Fault Loop Impedance’
- Section 7.5 reference to TN-S earthing added.
- Document reviewed.

Version	4.1	**Review Date**	23/06/2028
Date	20/11/2023	**Author**	Stephen Tucker

Reason for update: New open PEN detection device.

What has changed:

- Section 3 OPDD definition added.
- Section 5 section references updated in Table 5-1.
- Section 5, 6.2, 6.3 & 6.4 dedicated EV supplies included.
- Section 6.1 UMS requirements clarified and minor wording changes.
- Section 6.5 reinstated from v3.0.
- Section 7.5.2 OPDD term used.
- Section 7.5.2 CityEV device added to Table 7-4.
- Section 7.5.4 separation increased from 2 to 2.5 metres to align with BS 7671.
- Section 9.1 references updated.

Version	4.0	**Review Date**	23/06/2028
Date	22/06/2023	**Author**	Christina Tsechelidou

Reason for update: Periodic review.

What has changed:

- Section 4.1 & 7.1 Smart Connect Portal added.
- Section 4.3 UK Power Networks website for EV connections added.
- Section 5, Table 5-1 reformatted and updated to include maximum UMS and 80A fuses.
- Section 6.1 UMS fuse and cable sizes clarified.
- Section 7.2 network reinforcement guidance for EVCPs section revised.
- Section 7.5 earthing requirements included from EDS 06-0017.
- Appendix A link for ENA notification form updated.
- EDS 08-5050B withdrawn.
- Document reviewed.

Version	3.0	**Review Date**	23/03/2023
Date	13/05/2019	**Author**	Jack Lewis Wilkinson

Reason for update: Updates as per below.

- Guidance on UK Power Networks EVCP connections process has been provided.
- New evidence has allowed UK Power Networks to enhance fast and slow EVCP diversity factors, to enable quicker and lower cost EVCP connections for customers.
- Rapid EVCPs up to 50kW can be connected to 100A TPN domestic supplies under certain situations, and rapid EVCP diversity factors have been updated.

What has changed:

- Section 4 EVCP Connection Process section added.
- Section 5 supply overview section updated.
- Section 7.1 mandatory Notification Process section updated.
- Section 7.4 diversity Guidance section revised.
- Appendix A ENA EVCP notification form updated.
- Appendix B diagram showing typical domestic supply set-up and ownership boundaries added.

Version	2.0	**Review Date**	23/03/2023
Date	19/03/2018	**Author**	Stephen Cuddihey
Reason for update: Standard revised to encompass all the electric vehicle relevant requirements and the LV network connections design standards suite in one document for ease of use in electric vehicle connections. **What has changed:** • Section 5 supply overview section added. • Section 6 connection requirements revised included. • Section 7.3 disturbing load section updated. • EDS 08-5050B disturbing load assessment form added. • Minor revisions to all other sections, document title revised.			
Version	1.0	**Review Date**	20/06/2018
Date	20/06/2017	**Author**	Tobi Babalola
New standard to cover electrical vehicle charge equipment installation to the distribution network.			

Contents

Tables

1 Introduction

This standard provides guidance on the requirements for the connection of electric vehicle charge point (EVCP) equipment and includes the mandatory notification process.

Typically, customer requests for the connection of EVCP equipment to an existing supply are made via an EVCP installer. This standard establishes the requirements for EVCP installers, including:

- EVCP connection process (Section 4).
- Connection requirements (Section 5).
- Earthing requirements (Section 7).
- General requirements (Section 8).
- Commissioning, energisation and disconnection (Section 9).
- Mandatory notification process (Section 10).

Installers are required to notify UK Power Networks of intended EVCP installations at the earliest opportunity. Refer to Section 10 for guidance on the mandatory notification process for EVCP installers.

For the provision of a new supply to facilitate the connection of EVCP equipment, the requirements of this standard shall be considered and applied in accordance with the relevant connection standard (refer to Section 2).

For further information on all aspects of electric vehicle charging points, refer to the *IET Code of Practice on Electric Vehicle Charging Equipment Installation*.

UK Power Networks is not an enforcing or advisory body for BS 7671. Where questions of the adequacy of the customer's installation need to be resolved the electrical contractor should seek advice from the trade body providing their accreditation.

Arrangement of the customer installation is entirely at the discretion of the customer. Legislation requires that the customer installation shall be provided, installed, and maintained in accordance with BS 7671 by the customer's electrical contractor.

2 Scope

This standard applies to the connection of EVCP equipment in EPN, LPN and SPN.

This standard is designed to be applied in conjunction with the relevant connection standard:

- EDS 08-1103 for supplies to multi-occupied buildings.
- EDS 08-2100 for supplies above 100A (69kVA).
- EDS 08-2101 for supplies up to 100A (69kVA).
- EDS 08-2102 for unmetered supplies.

This standard is designed to work in conjunction with the LV network design standard EDS 08-2000.

This standard does not apply to IDNO EVCPs; for IDNO networks refer to EDS 08-1101.

Note: Vehicle to grid (V2G) and vehicle to load (V2L) technology is not in the scope of this standard. These technologies enable the energy stored in electric vehicles to be fed back into the electricity network (grid) and the customers installation (load) to help supply energy at times of peak demand. V2G and V2L chargers have the ability to export as well as import power. Relevant information and the application process can be found on the Smart Connect portal.

3 Glossary and Abbreviations

Term	Definition
CCCMS	Common Connection Charging Methodology Statement
CNE	Combined Neutral and Earth.
DNO	Distribution Network Operator
ENA	Energy Networks Association
EVCP	Electric Vehicle Charge Point
EHV	Extra High Voltage. In the context of this document EHV refers to voltages at 132 kV, 66kV and 33kV
HV	High voltage. Any voltage exceeding LV (as defined by The Electricity Safety Quality and Continuity Regulations 2002). In the context of this document, HV refers to 20kV 11kV, 6.6kV, 3kV and 2kV
ICP	Independent Connection Provider
IDNO	Independent Distribution Network Operator
LV	Low voltage. 'A voltage exceeding 50V (rms) measured between phases (or phase to earth) but not exceeding 1000V phase to phase or 600V phase to earth' (as defined by The Electricity Safety Quality and Continuity Regulations 2002)
mCMS	Measured Central Management System
MPAN	Meter Point Administration Number
MPR	Maximum Power Requirement
OPDD	Open PEN Detection Device. A device that detects a broken neutral and disconnects the supply
PEN	Protective Earthed Neutral
PME	Protective Multiple Earthing
Pup Fuse	A fuse way, which is connected to an approved 100A cut-out to provide a secondary supply or additional supply point. For an additional supply point, the fuse way forms the point of isolation
SNE	Separate Neutral and Earth
TN-C-S	Terre Neutral-Combined-Separate. Refer to EDS 06-0017 for further information.
TN-S	Terre Neutral Separate. Refer to EDS 06-0017 for further information
TT	Terre Terre. Refer to EDS 06-0017 for further information
UK Power Networks	UK Power Networks (Operations) Ltd consists of three electricity distribution networks: • Eastern Power Networks plc (EPN). • London Power Network plc (LPN). • South Eastern Power Networks plc (SPN).
UMS	Unmetered Supply
V2G	Vehicle to Grid
V2L	Vehicle to Load

4 EVCP Connection Process

The flowchart shown in Figure 4-1 provides guidance on the EVCP connection process for installers intending to connect EVCP equipment to an existing supply.

The installer is required to assess the supply to establish if the connection can be made without referral to UK Power Networks. For guidance on supply capacity and requirements for UK Power Networks assessment, refer to Section 5.

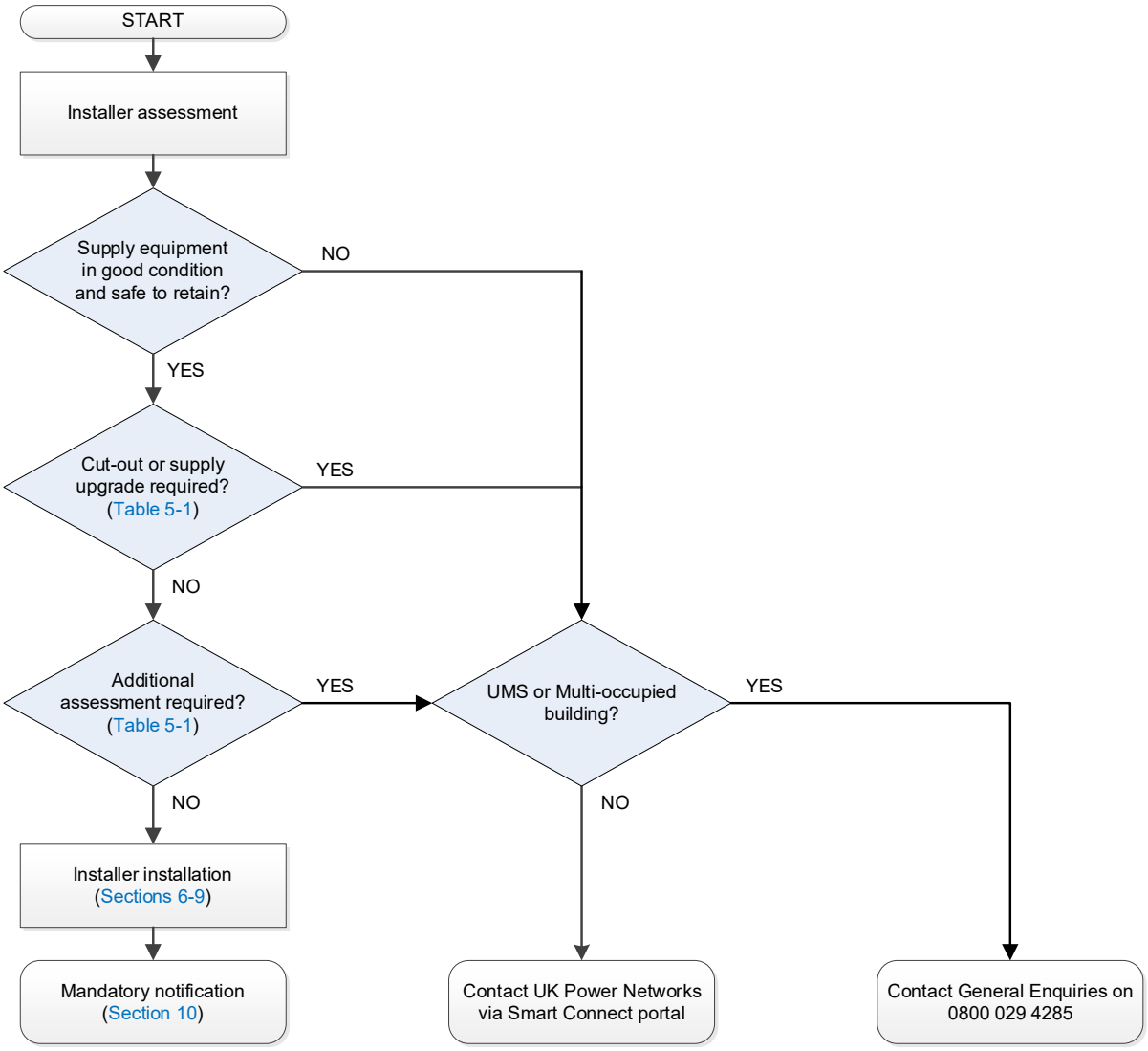


Figure 4-1 – Installer Assessment Process

5 Supply Overview

Table 5-1 specifies the supplies that are required for various EVCPs. The table also specifies the instances where thermal capacity and power quality assessments shall be completed by UK Power Networks.

For additional connection requirements, refer to Section 6.

Table 5-1 – EVCP Supply Overview

Type	Total MPR Available (kVA)	Max. EVCP (Typical EVCPs)		Standard	Typical Earthing (Section 7)
		Max. without assessment*	Max. with assessment**		
25A UMS (Section 6.1)	5.75	5kW***	n/a	EDS 08-2102	TT
100A Single-phase (Public Highway)	23	7kW	22kW	EDS 08-2101	TT
100A Three-phase (Public Highway)	69	7kW (per phase)	50kW	EDS 08-2101	TT
80A Single-phase (Section 6.2)	18	3.6kW	7kW	EDS 08-2101	PME
80A Three-phase	55	7kW (per phase)	15kW	EDS 08-2101	PME
100A Single-phase (Section 6.2)	23	7kW	15kW	EDS 08-2101	PME
100A Three-phase	69	7kW (per phase)	50kW	EDS 08-2101	PME
Large LV (200A+)	≤1500	n/a	up to 1500kVA	EDS 08-2100	Case specific
HV Supplies	Limited by MPR	n/a	All load	EDS 08-3100	Case specific
EHV Supplies	Limited by MPR	n/a	All load	EDS 08-3100	Case specific
Multi-occupied Building (including car parks)	Limited by MPR	n/a	All load	EDS 08-1103	Case specific

* Possible to connect without additional assessment.

** Possible to connect subject to thermal capacity and power quality assessment (Section 8.2). Max. values assume other load is connected, the total MPR may be considered for dedicated EVCP supplies.

*** Refer to Table 6-1 for fuse and cable requirements.

6 Connection Requirements

6.1 Unmetered Supplies

EVCP connections shall comply with the requirements of Section 5. This section details the additional requirements for the connection of EVCPs to existing unmetered supplies.

For earthing requirements, refer to Section 7.

A single EVCP may be connected to an UMS provided it satisfies the following criteria:

- The EVCP shall be used in conjunction with a measured central management system (mCMS)[1].
- The EVCP shall not be used for fast or rapid charging[2].
- The EVCP shall comply with the requirements of EDS 08-2102 (the 500W and 2kW maximum load limits only apply to the unmetered asset and not the EVCP).
- The total MPR shall include the unmetered asset and the EVCP.
- The EVCP MPR shall be constrained by the fuse rating and the cable loop impedance value of the UMS in accordance with Table 6-1. Where either of these is insufficient for a proposed EVCP/UMS combination, a service alteration shall be requested from UK Power Networks or an approved ICP.
- The EVCP earthing shall comply with Section 7. Where the UMS earthing differs from the requirements of Section 7, the UMS shall be converted accordingly. This may have wider implications for EVCPs derived from looped or other complex UMS scenarios and should be considered prior to installation.

UMS EVCPs shall **not** be derived from:

- Looped supplies without a prior agreement with UK Power Networks.
- Unmetered three-phase supplies.
- Fifth core and other switched supplies.
- Supplies referred to as ‘historic cables and cut-outs’, as detailed in EDS 08-2102.

UMS EVCPs may be derived from overhead lines but replacement for an underground service should be considered if practical.

[1] The mCMS measures consumption events and sends a log to the owners’ meter administrator (MA), which is matched to the inventory reports processed by the DNO on behalf the customer and reported to the MA. The MA produces a consumption report of the actual consumption as opposed to predictable consumption. EVCPs are only permitted via UMS on this basis. There are currently 9 active UMS EVCP portfolios.
[2] Fast and rapid chargers typically have an output greater than 7kW. This output is higher than the requirement of Table 6-1.

Table 6-1 – Unmetered EVCP Requirements

Max EVCP (kW)	Fuse Size (A)	Max. Phase to Neutral Loop Impedance (Ω)[1]	Max. Earth Fault Loop Impedance (Ω)[2]	
			CNE Cable	SNE Cable
1	6	1.5	1.5	12
3	10	1.38	1.38	6.8
5	25	0.55	0.55	2.2

[1] The phase-neutral fault loop impedance applies to all connections (TN-C-S, TN-S, TT) and has been selected to ensure the maximum volt drop is 6% and to reduce voltage rise on the metalwork.

[2] The earth fault loop impedance applies to TN-C-S/TN-S connections and has been selected to ensure the fuse operates within the required time to protect the cable. For higher values of earth fault loop impedance, a smaller fuse may be required to comply with EDS 08-2102.

6.2 Single-Phase Supplies

EVCP connections shall comply with the requirements of Section 5. This section details the additional requirements for the connection of EVCPs to existing single-phase supplies.

For earthing requirements, refer to Section 7.

6.2.1 Pup Fuses

Existing UK Power Networks approved 100A single-phase cut-outs may include the facility for a parallel 30A fuse or ‘pup fuse’ (refer to Section 3). Where included, the pup fuse may be used to provide a direct connection of an EVCP (up to 7kW) in accordance with EDS 08-2101.

Note: The pup fuse shall only be used on an existing single-phase service. Pup fuses shall **not** be installed retrospectively to facilitate direct connections to EVCP equipment.

6.2.2 Service Upgrades

For existing single-phase supplies, a service upgrade to 100A (single-phase or three-phase) is required in accordance with EDS 08-2101 to accommodate the additional load where the:

- MPR of the EVCP combined with the existing load exceeds 18kVA (for an 80A service).
- MPR of the EVCP combined with the existing load exceeds 23kVA (for a 100A service).

7 Earthing Requirements

The earthing requirements for EVCPs will depend on the earthing arrangements of the electrical supply to the charge point and the location of the charge point. The requirements for EVCPs in the public highway and buildings are detailed in Sections 7.1 and 7.2 below.

Further guidance on TT earthing is included in Section 7.3.

For further guidance on earthing, refer to EDS 06-0017.

7.1 Public Highway

EVCP supplies in the public highway, public car parks and similar locations or those constructed to a no lesser standard than a public highway/car park shall be earthed in accordance with Table 6-1.

Table 7-1 – EVCP Earthing Arrangements in the Public Highway

Supply	TN-C-S	TN-C-S + OPDD (Appendix B)	TN-S	TT (Section 7.3)
25A UMS	✘	✓	✘	✓
100A Single-phase	✘	✓	✘	✓
100A Three-phase	✘	✓	✘	✓
Large Supply (cut-out)	✘	✓	✘	✓
Large Supply (substation)	✘	✘	✓	✘

7.2 Buildings

EVCPs shall be earthed in accordance with the existing building earthing arrangement and may use TN-C-S, TN-S or TT as appropriate.

A TN-C-S (PME) earth terminal may be provided to a premise with an EVCP that is not electrical street furniture (e.g. domestic or small commercial installation) subject to the general requirements of BS 7671 Regulation 722.411.4.1 (limitation of earth potential rise to 70V). The customer's electrical designer/installer is responsible for ensuring that any TN-C-S (PME) earth terminal is used appropriately and conforms to the requirements of BS 7671.

It is the responsibility of the EVCP installer to ensure that:

- The earthing and bonding arrangements comply with the requirements of BS 7671.
- Any earth terminal provided for the premise is used appropriately.

7.3 TT Earthing

Any TT earthing system (and anything connected to it) shall be segregated by a minimum of 2.5 metres from all other earthing systems (TN-C-S, TN-S, TT). This can usually be achieved by ensuring there is 2.5 metres separation above ground between earthed metalwork.

The TT earthing system shall also be segregated by a minimum of 8m from any substation with separate HV-LV earths and associated cables to limit the effect of transfer voltage between earthing systems. Where reasonably practicable, consideration should also be given to the presence of underground earth electrodes.

The intention of these requirements is to ensure that significant hand-to-hand or hand-to-feet shock risk does not arise due to voltage differences between two different earthing systems.

Note: Refer to the *IET Code of Practice on Electric Vehicle Charging Equipment Installation* for further guidance on separation of EVCP earthing systems.

The supply, installation and maintenance of a TT earthing system is the responsibility of the customer.

8 General Requirements

8.1 Network Reinforcement

For network reinforcement costs, refer to CCCMS (external) and/or CON 00 024 (internal).

8.2 Power Quality and Disturbing Loads

Where required by Table 5-1 the connection of potentially disturbing equipment to the distribution network shall be assessed in accordance with ENA EREC G5. Disturbing equipment is any equipment that has the potential to cause voltage harmonic distortion. The majority of equipment used to charge electric vehicles falls into this category.

The data collection form in EDS 08-5055 shall be completed and submitted to UK Power Networks with an EVCP application. For multiple variants of different/unique chargers, a data collection form shall be submitted for each different type of charger. UK Power Networks shall subsequently carry out a power quality assessment in accordance with EDS 08-5055. Where power quality is not a constraining factor for the connection of chargers, the number of chargers to be connected should be assessed via a thermal assessment.

8.3 Ownership Boundaries

In all instances, the ownership boundary shall be at the outgoing terminals of the cut-out. Appendix C includes a diagram of a typical domestic supply set-up, and the ownership boundaries between the customer, supplier and DNO.

The ownership boundary shall be indicated on site using the approved boundary label 20042K (refer to EAS 07-0021).

For supplies in the public highway, inspection and reporting of service termination issues will be required by the customer or public lighting authority.

8.4 Legal Requirements

All necessary consents relating to the service cables and access arrangements shall be provided by the customer. If UK Power Networks equipment is to provide a strategic purpose additional to the function of a supply point for an unmetered supply customer, UK Power Networks shall ensure that its interests are adequately protected by the agreed tenancy arrangements. Necessary land rights shall be secured before starting construction.

9 Commissioning, Energisation and Disconnection

Refer to the appropriate connection standard for the correct commissioning, energisation and disconnection procedures required for each supply, including the requirements for MPANs where required.

10 Mandatory Notification Process

Installers are required to notify UK Power Networks of intended EVCP connections at the earliest opportunity and no later than the date of installation. This applies to all EVCP connections unless the connection is already known to UK Power Networks as part of a new development connection application.

EVCP connection notifications shall be archived and recorded by UK Power Networks in the central data repository where the data can be used for regulatory reporting and analysis.

For domestic and small business EVCP connections (up to 100A):

- Regional installers shall notify UK Power Networks via the online Smart Connect portal.
- National installers shall notify UK Power Networks via the ENA Connect Direct portal.

For all other EVCP connections (large commercial schemes, UMS, multiple installations, and multi-occupied buildings), installers shall complete and submit the ENA notification form (see Appendix A) to evnotifications@ukpowernetworks.co.uk.

If an installer is unsure of the EVCP connection type, contact the Connections Gateway on 0203 324 1460.

11 References

11.1 UK Power Networks Standards

EDS 06-0017	Customer LV Installation Earthing Design
EBB 06-0106	Guidance on Open PEN Detection Devices for Electric Vehicle Charging Points
EAS 07-0021	Operational Signs and Labels Material List
EDS 08-1101	IDNO Networks
EDS 08-1103	Multiple Occupancy Building Supplies
EDS 08-2000	LV Network Design
EDS 08-2100	LV Customer Supplies above 100A
EDS 08-2101	LV Customer Supplies up to 100A
EDS 08-2102	Customer Unmetered Supplies
EDS 08-3100	HV and EHV Customer Demand and Generation Supplies
EDS 08-5055	Power Quality Assessment Process for Mode 4 Electric Vehicle Charging Points and Heat Pumps
CON 00 024	Connection Charge Manual (internal use only)
CCCMS	Statement of Methodology and Charges for Connection to the Electricity Distribution Systems of Eastern Power Networks Plc, London Power Networks Plc & South Eastern Power Networks Plc

11.2 National Standards

BS 7671:2018+A2:2022	Requirements for Electrical Installations (IET Wiring Regulations 18th Edition)
	IET Code of Practice on Electric Vehicle Charging Equipment Installation
ENA EREC G5	Harmonic Voltage Distortion and the Connection of Harmonic Sources and/or Resonant Plant to Transmission Systems and Distribution Networks in the United Kingdom
ENA EREC G12	Requirements for the Application of Protective Multiple Earthing to Low-voltage Networks
	REC Guidance for Service Termination Issue Reporting

Appendix A – ENA Notification Form

The ENA notification form is available from the ENA website and shall be submitted to UK Power Networks where required by Section 10.

The latest version of the form can be accessed via the link below:

Single-Electric-Vehicle-Charge-Point-and-Heat-Pump-Installation-Application-Form.docx (live.com)

If you have any difficulty in accessing the form, visit ENA's website:

Connecting electric vehicles and heat pumps to the networks – Energy Networks Association (ENA)

Or contact ENA at info@energynetworks.org.

Appendix B – Assessed Open PEN Detection Devices

Table B-1 provides details of the assessed OPDDs for use on the UK Power Networks distribution network.

Evidence has been provided by the manufacturer/supplier that the devices listed satisfy the criteria detailed in ENA EREC G12 Issue 5 Section 6.2.16.2.

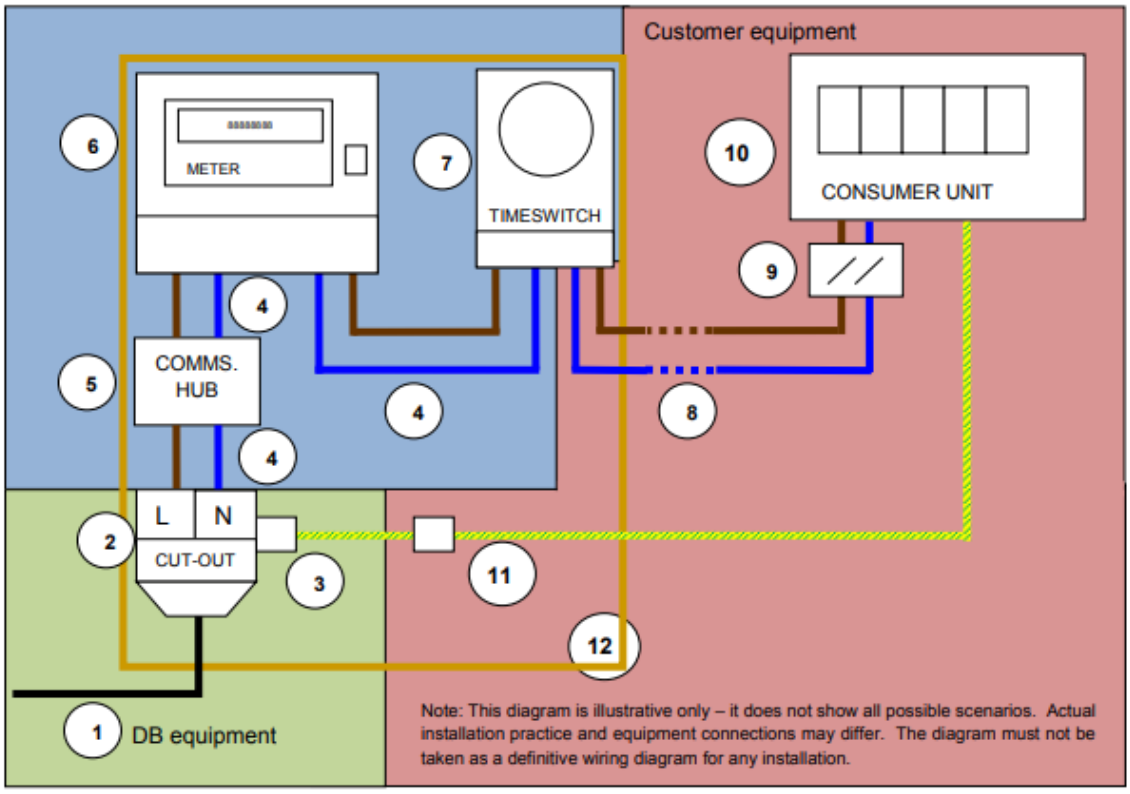
For guidance on the application and assessment of open PEN devices, refer to EBB 06-0106.

Table B-1 – Assessed OPDDs

Manufacturer	Address	Device	Date Added
Char.gy Ltd	55 King William St London EC4R 9AD	On Door Charge Point (ODCP) CP-X-002, CP-X-003.	03/07/2025
CityEV Ltd	Technopole Kingston Crescent Portsmouth PO2 8FA	Cityline and EVline Safevolt® 100 models. Cityline and EVline Safevolt® 300 models.	20/09/2023
Matt:e Ltd	Unit 1 Langley Brook Business Park Middleton Tamworth B78 2BP	MTE/A 5P, MTE/A 3P, MTE/A 13-32G, O-PEN Monitor.	01/05/2023
Any additional devices provided by the manufacturers above that fundamentally use the same core technology as the devices listed is also considered assessed and approved for use on the UK Power Networks distribution Network.			

Appendix C – Typical Domestic Setup and Ownership Boundaries

The following diagram is from the Retail Energy Code (REC) 'Guidance for Service Termination Issue Reporting V4.1', it shows a typical domestic supply set-up. The aim of the diagram is to clarify boundaries of responsibility; it is for illustrative purposes only and does not show all possible scenarios.



DB equipment	Supplier equipment	Customer equipment
1 - Service cable	4 - Meter tails (cut-out to meter and meter to timeswitch)	8 - Meter tails (between the meter / timeswitch and the Customer equipment)
2 - Cut-out (or main fuse or DB fuse)	5 - Communications hub if fitted (may be within the meter)	9 - Customer isolating switch (if fitted / requested)
3 - DB earth terminal	6 - Meter	10 - Customer consumer unit
	7 - Timeswitch (if fitted)	11 - Customer earthing conductor (and earth block if fitted)
		12 - Meter board (and external meter box if fitted)