eMobility solutions

Building the future of all-electric mobility

Electric vehicle charging solutions

Catalog 2023

se.com/emobility

Life Is On Schneider Electric

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Green Premium™

Schneider Electric's commitment to deliver sustainable performance, by design.

More than 75% of our product sales offer superior transparency on the material content, regulatory information and environmental impact of our products:

- RoHS compliance
- REACh substance information
- Industry leading # of PEP's*
- Circularity instructions

Learn more about Green Premium

Green Premium label promises compliance with the latest regulations, transparency on environmental impacts as well as circular and low-CO_2 products.

CO_2 and P&L impact through… Resource Performance

Green Premium brings improved resource efficiency throughout an asset's lifecycle. This includes efficient use of energy and natural resources, along with the minimization of CO_2 emissions.

Cost of ownership optimization through… Circular Performance

We're helping our customers optimize the total cost of ownership of their assets. To do this, we provide IoT-enabled solutions, as well as upgrade, repair, retrofit, and remanufacture services.

Peace of mind through… Well-being Performance

Green Premium products are RoHS and REACh compliant. We're going beyond regulatory compliance with step-by-step substitution of certain materials and substances from our products.

Improved sales through… Differentiation

Green Premium delivers strong value propositions through third-party labels and services. By collaborating with third-party organizations we can support our customers in meeting their sustainability goals such as green building certifications.

*PEP: Product Environmental Profile (i.e. Environmental Product Declaration)

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*Available soon in selected European countries

eMobility solutions

Extensive network of certified partners

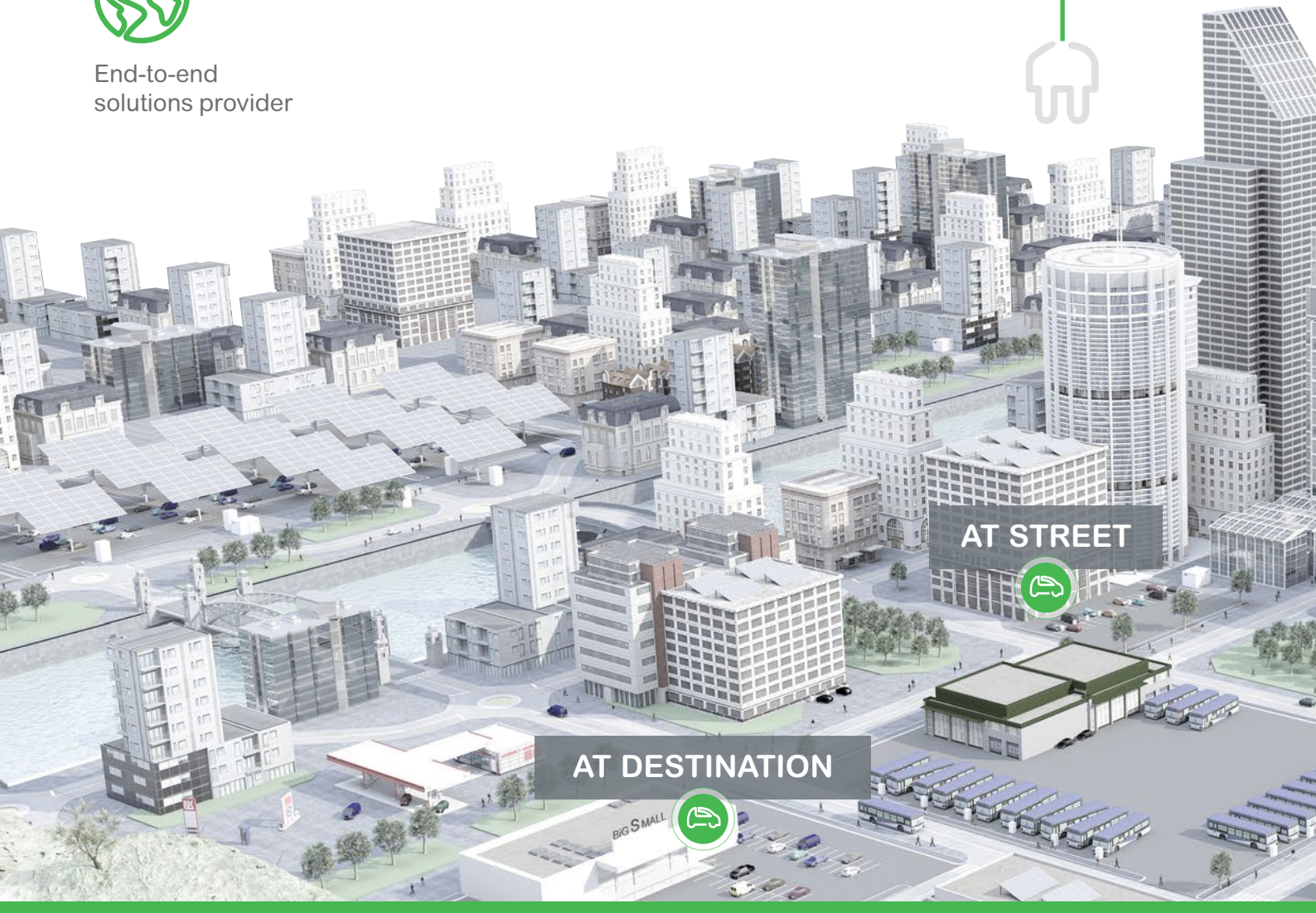
Industry standards compliance

Worldwide customer support

End-to-end solutions provider

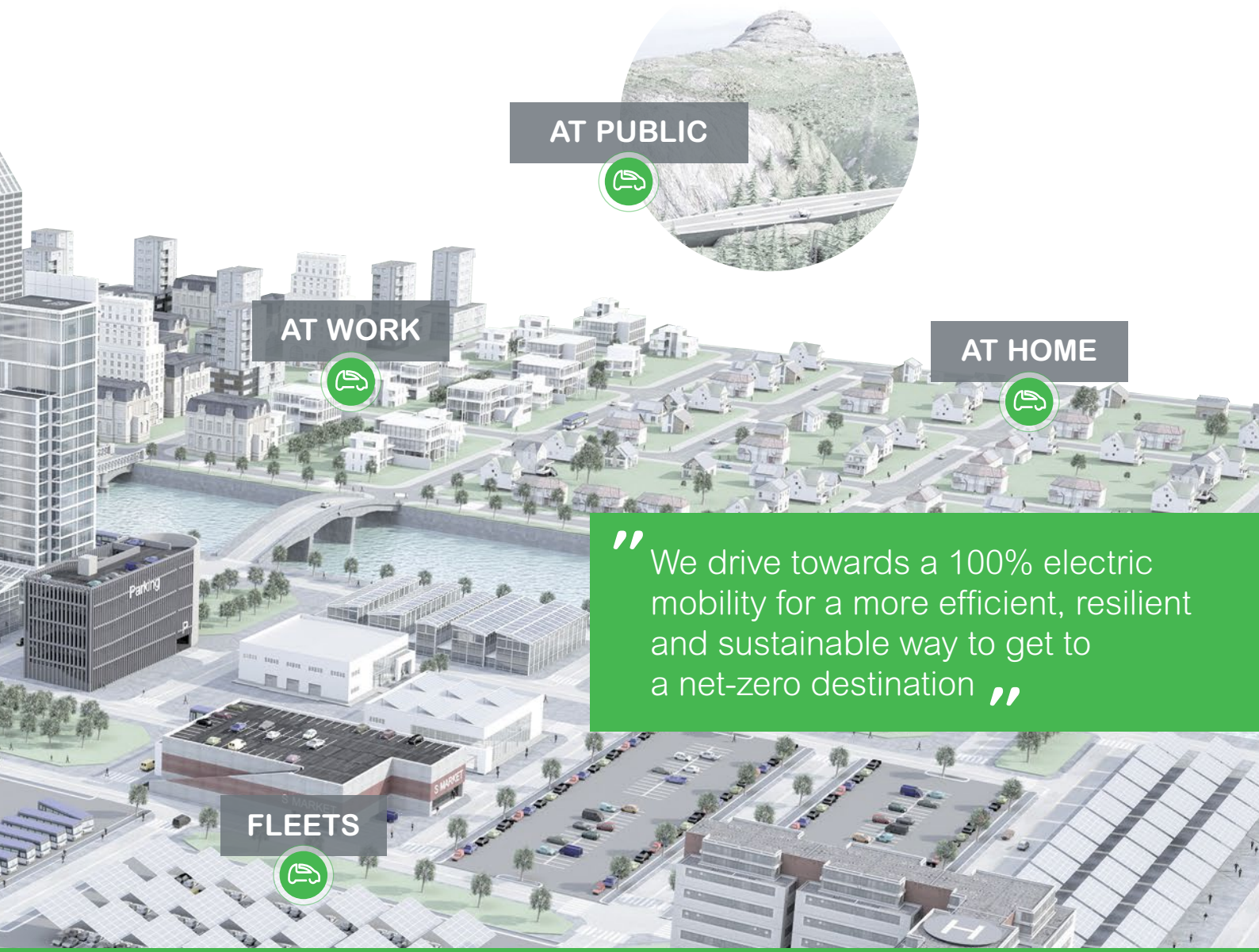
Building the mobility of the future

SCALABILITY AND RESILIENCY
EFFICIENCY AND SUSTAINABILITY
CONNECTIVITY AND INTEROPERABILITY
CYBERSECURITY



We provide end-to-end eMobility solutions, beyond the EV charging infrastructure, where the whole electric mobility ecosystem is connected to provide cost-efficient and convenient charging experience for homes, buildings, and fleets, minimizing downtime and prioritizing the use of renewable energy for a net-zero future.

- Homes
- Buildings
- Fleets



"We drive towards a 100% electric mobility for a more efficient, resilient and sustainable way to get to a net-zero destination"

eMobility for Single Family Homes

Charge your car with a smart End-to-End solution

> "I want to charge my car without tripping my house, while optimizing my comfort and keeping my energy consumption under control."

EVlink Home Smart provides homeowners with an easy smart charging experience.
Charge at the right time, with the option to select the most suitable charging mode, while optimizing energy usage and avoiding power overruns.

Watch the video

EVlink Home Smart

Wall-mounted charging station

Convenient, compliant and attractive design:

- A full range of products: T2 socket, with or without attached cable, 3 power ranges available (Certification: CE 61851-1 ed 3.0)
- Built-in internal protection: RDC-DD 6 mA
- Communication protocol OCPP1.6J to connect to Wiser application
- User-friendly LED status indicator

Anti-Tripping Module

Power load management

- Continuously adapt the power supplied to charge the car, taking home consumption into account
- No need for an additional communication cable (Power Line Communication)

Wiser Mobile App

Connected technology

- Remote control and scheduling of EV charging
- Bill optimization based on ToU tariff
- Energy consumption monitoring

Customer benefits

Peace of mind | Convenience | Sustainability | Efficiency

For the homeowner:

- No disruption to lifestyle while the installation is running
- Optimized charging sessions
- EV charging schedule to avoid peak tariffs
- Competitive and certified offer

For home builders:

- Benefit of Schneider Electric's reputable network of certified partners
- Competitive and certified offer

For electricians:

- Reduced installation time
- Schneider Electric certification and training
- Products available from distributors

For distributors:

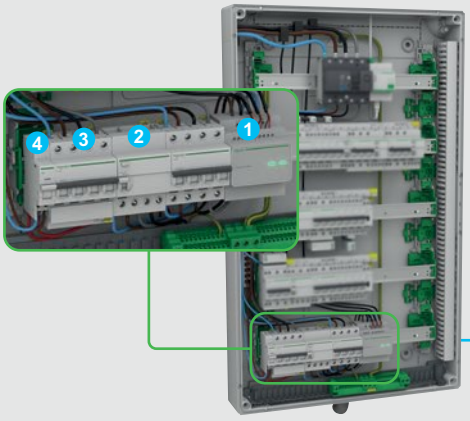
- Competitive offer to become the One-Stop Shop for EVs
- Entire application sales with strong market demand

Smart charging End-to-End Solution

Protect
the electrical installation

Charge
your **EV**

Optimize
your energy consumption



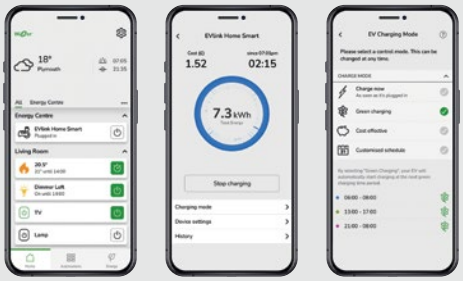
Router

(WiFi or RJ45)

Power Line Communication

Wiser™

Home Energy Management System



All-in-one application | Energy consumption dashboard | Charging mode selection

1. **EVlink anti-tripping module:** 1-or 3-phase peak controller
2. **RCD Type A-SI** to detect 30 mA AC residual current
3. **MCB** to provide charging station cable overload protection
4. **MNx:** undervoltage release tripping unit (IEC 61851-1 ed.3)

RCBO (option): residual current breaker with overcurrent protection

EVlink Home Smart

Power: from 3.7 to 11 kW

Watch the video

Commission easily with **eSetup**

Watch the video

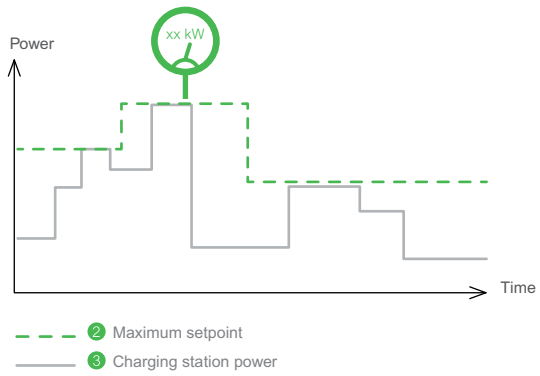
Operate with **Wiser**

eMobility for new residential buildings

Design a scalable and service-ready infrastructure

> "I want to provide an EV charging infrastructure which is compliant with local regulations, scalable, and service-ready for new residential buildings."

EcoStruxure for eMobility is a solution ready for the sustainable and efficient buildings of the future.
It offers multi-dwelling owners and tenants a user-friendly charging experience with optimized power supply and accurate consumption metering per user for allocation of costs.
It is an open, standards-compliant, and service-ready solution.



EcoStruxure EV Charging Expert

Load Management System

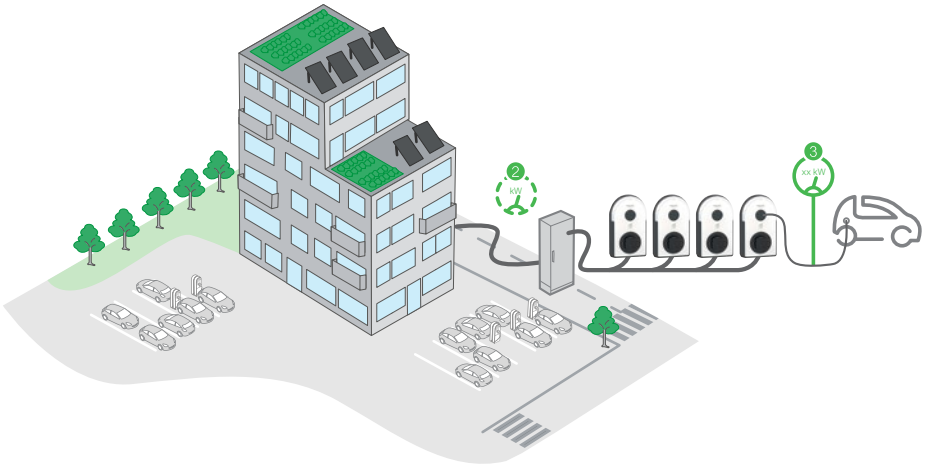
- Distribution of available power for all charging stations
- Peak/off-peak hours EV charging management
- Monitoring and control of any EV charging station based on an open protocol (OCPP 1.6-J)

Watch the video

EVlink Pro AC

Connected EV charging station

- Robust design that is rated IP55/IK10, for outdoor or indoor installations
- Embedded protection for power distribution (RCD; iMNx)
- RFID/NFC reader for user authentication
- Standards-compliant:
  - Precision metering (MID meters)
  - Interoperability with supervision solutions (OCPP 1.6-J)
  - Extended EV compatibility (IEC 61851 Ed.3, ISO 15118 ready)



Customer benefits

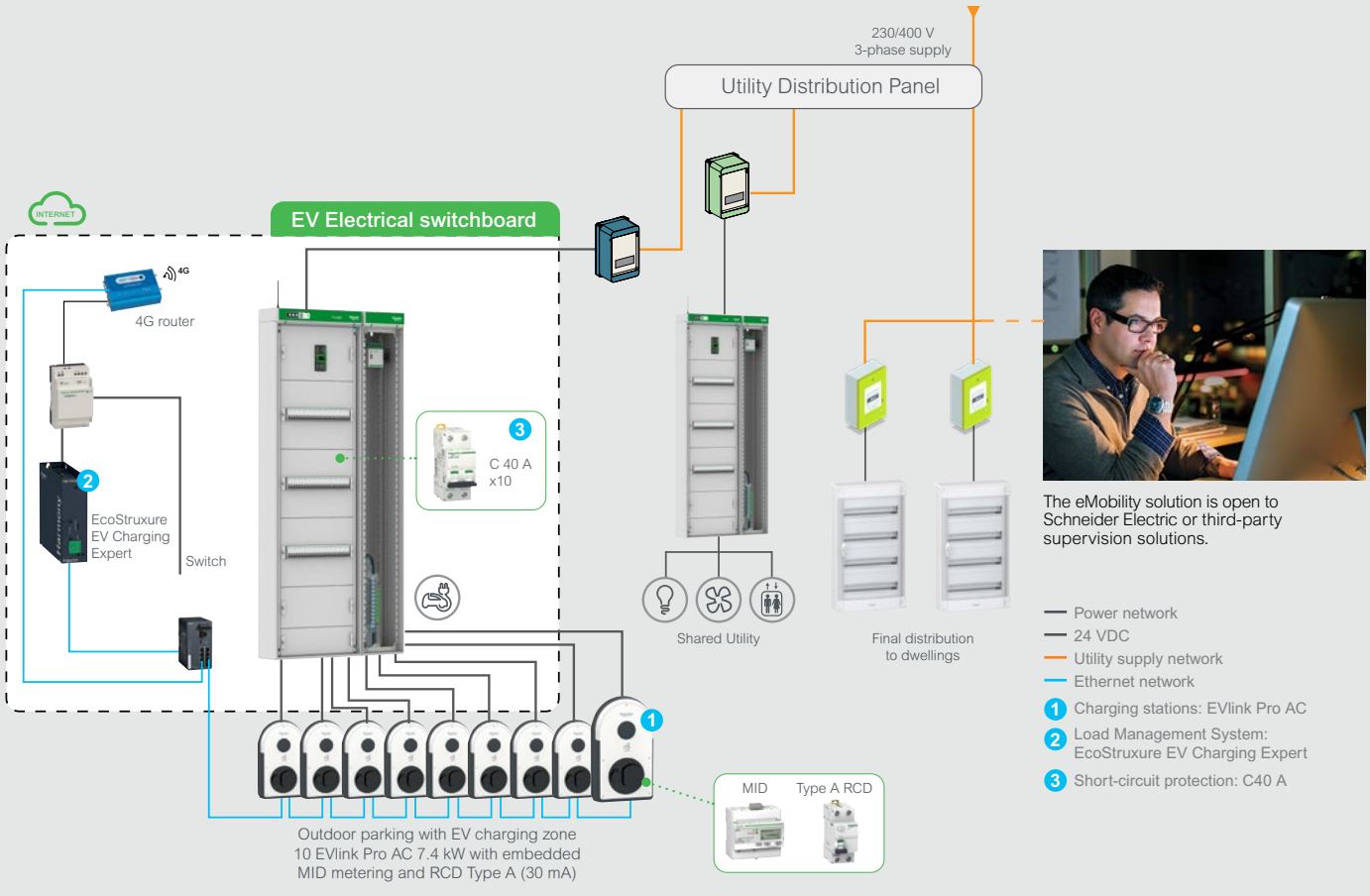
For home builders designing the EV infrastructure:

- Compliant with local regulations
- Scalable and flexible design
- Open and ready for operations
- Minimized property development costs

For the electrical contractor installing and commissioning the EV infrastructure:

- Reduced installation time
- Guided commissioning for basic or larger infrastructure
- Schneider Electric Partner certification and training program

New residential building solution ready for operations



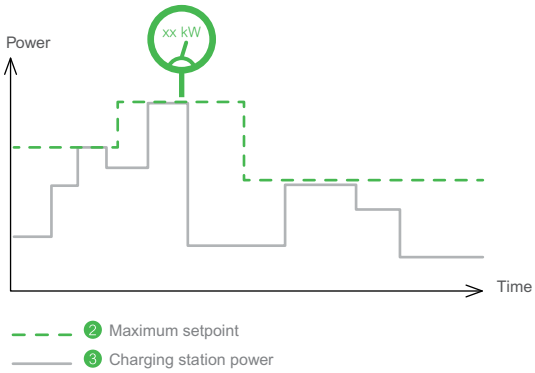
The eMobility solution is open to Schneider Electric or third-party supervision solutions.

eMobility for single tertiary sites

Get started with a scalable charging solution that will boost your brand image

> "I want to offer my employees the opportunity to charge at work while leveraging new charging services I can offer to my customers."

EcoStruxure for eMobility provides a first easy step for business owners to start up electric mobility in their companies while keeping investment, utility costs and power supply fully optimized. Improving the customer experience and satisfying employees driving an electric vehicle, all at the same time.



EcoStruxure EV Charging Expert

Load Management System

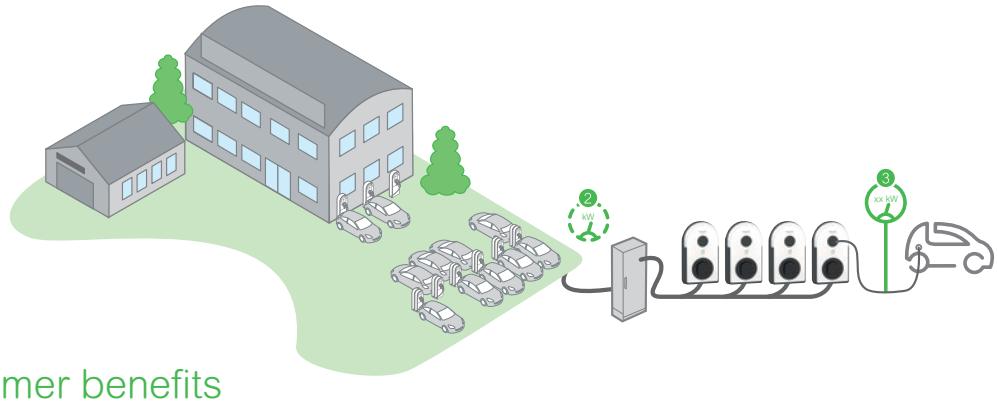
- Dynamic distribution of available power among charging stations
- Peak/off-peak hours EV charging management
- Monitoring and control of EV charging stations based on an open protocol (OCPP 1.6-J)

Watch the video

EVlink Pro AC

Connected EV charging stations

- Optimized usage and usability:
  - Reduced maintenance time
  - Robust design (IP55/IK10 rated) for indoor/outdoor installations
  - Customizable charging stations
- Embedded protection for power distribution (RCD; iMNx)
- RFID/NFC reader for user authentication
- Standards-compliant: precision metering (MID meters)
- Flexible and modular:
  - Interoperability with supervision solutions (OCPP 1.6-J)
  - Extended EV compatibility (IEC 61851 Ed.3, ISO 15118 upgradable)



Customer benefits

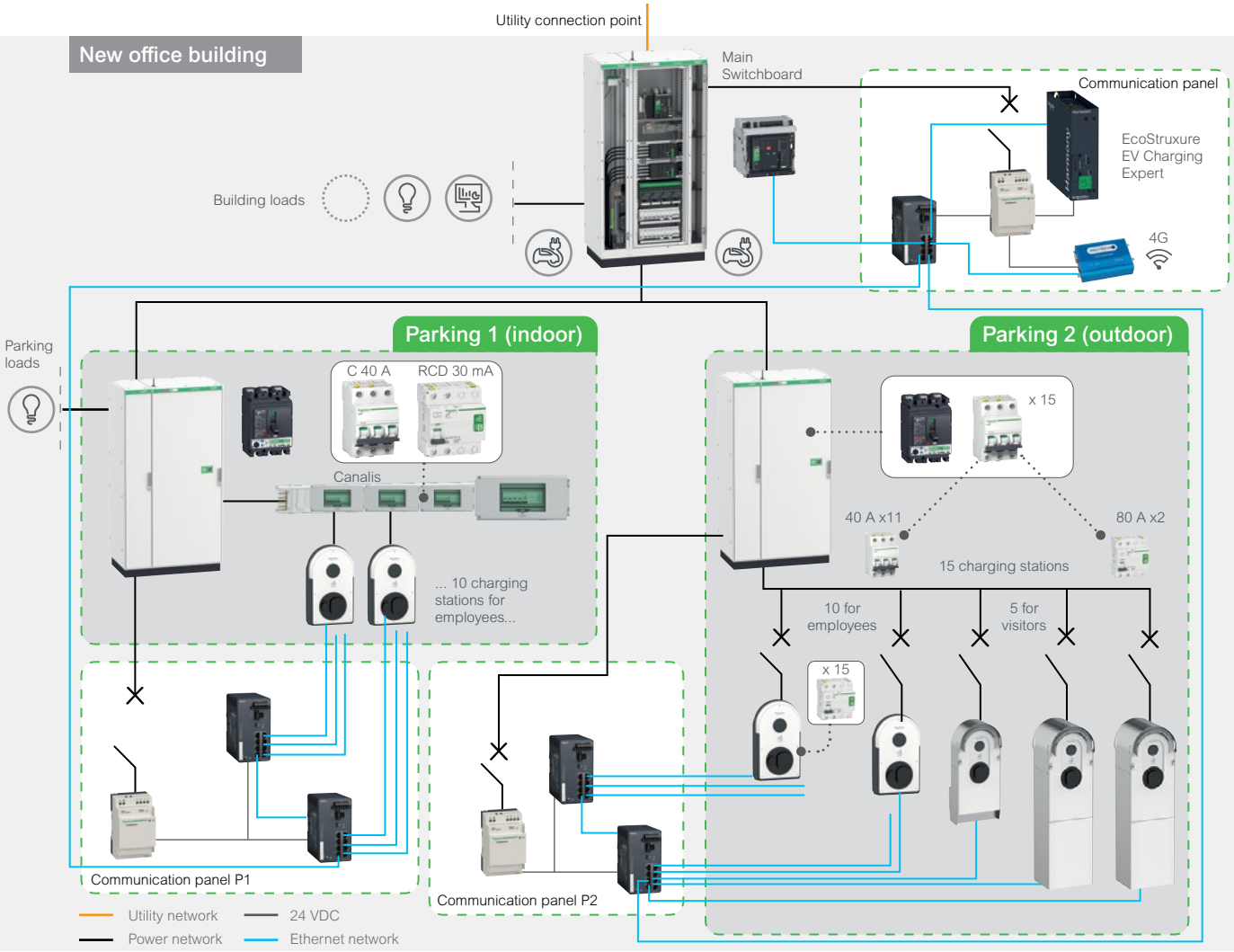
For building owners:

- Demonstration of sustainability commitments
- Improved employee satisfaction and customer loyalty
- Optimized power availability
- Scalable infrastructure
- In-house operations or delegated to external charge point operator

For electrical contractors:

- Reduced installation time
- Guided commissioning
- Schneider Electric Partner certification and training program

Charging infrastructure for employees or customers driving EVs

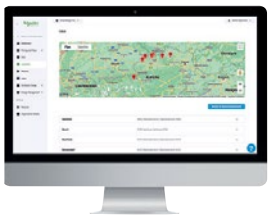


eMobility for charging infrastructure at work

Integrate a complete smart EV charging solution and optimize power availability at your sites

> "Installing an EV charging solution will boost my employee loyalty and help me meet sustainability targets while increasing the value of my property."

EcoStruxure for eMobility lets building and business owners seamlessly integrate electric mobility at their sites without compromising their power supply. They comply with local regulations while offering a futureproof and convenient solution to electric vehicle drivers at their sites.



EcoStruxure™ EV Advisor*

Multi-site remote supervision for EV charging infrastructures

- EV driver profile management
- Remote monitoring, control and troubleshooting
- Custom tariff setting
- Analytics and API capability

*Available soon in selected European countries

EcoStruxure™ EV Charging Expert

Load Management System

- Dynamic distribution of available power among charging stations
- Peak/off-peak hours EV charging management
- Monitoring and control of EV charging stations based on an open protocol (OCPP 1.6-J)

EVlink Pro AC

Connected EV charging station

- Robust IP55/IK10 rated design for outdoor or indoor installations
- Embedded protection for power distribution (RCD; iMNx)
- RFID/NFC reader for user authentication
- Standards-compliant:
  - Precision metering (MID meters)
  - Interoperability with supervision solutions (OCPP 1.6-J)
  - Extended EV compatibility (IEC 61851 Ed.3, ISO 15118 ready)

Customer benefits

For building owners:

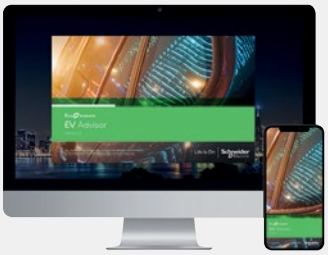
- Demonstration of sustainability commitments
- Improved employee loyalty
- Minimized upfront costs
- Optimized power availability and reduced energy costs
- Multiple user profiles

For operators:

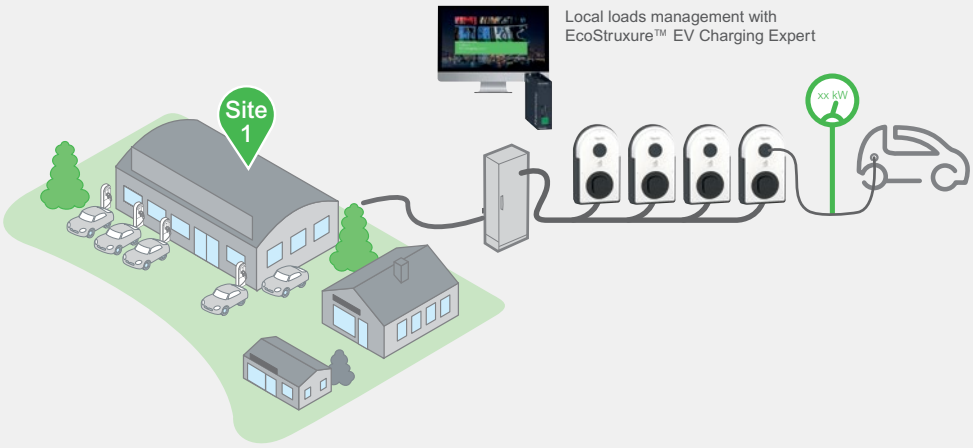
- Service offer: charge point availability, identification of issues
- Optimized operations thanks to remote diagnosis features and shorter interventions

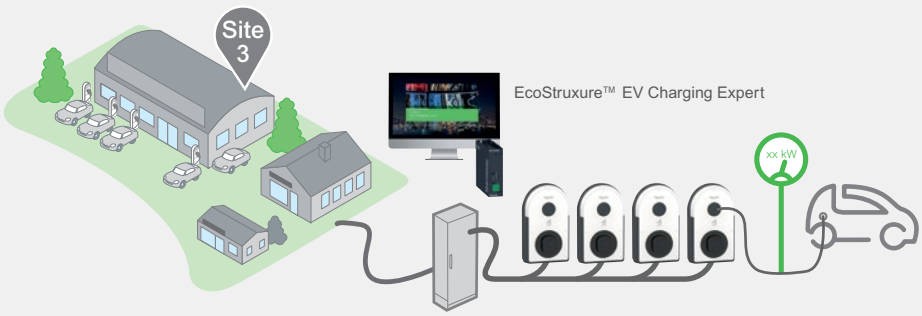
For electrical contractors:

- Reduced installation time
- Guided commissioning for basic or large scale infrastructure
- Schneider Electric Partner certification and training program



Multi-site and remote supervision of all the EV infrastructure thanks to EcoStruxure™ EV Advisor





eMobility for Car Parks

Offer a best-in-class EV parking experience and the benefit of a future-proof solution to generate new revenues

> "I want to get a scalable EV-charging solution fully integrated in my parking lot to offer visitors a one-stop service."

With EcoStruxure for eMobility, parking and EV-charging offer a fully integrated one-stop service for visitors increasing customer satisfaction and generating new revenues at the same time.

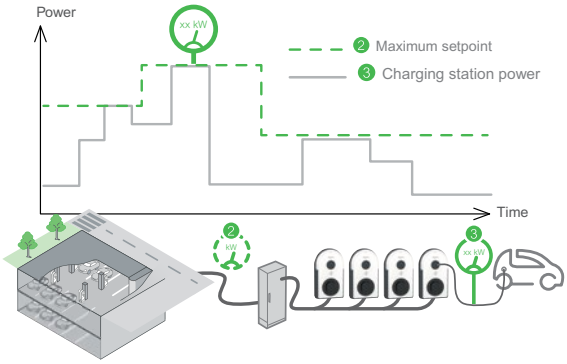
The combination of high-quality chargers, flexible and scalable solutions and Schneider Electric load management expertise can help you start and quickly grow your own EV-charging business.

EcoStruxure™ EV Advisor

Parking Management System

Cloud-based supervision and parking management system integration

- eMobility solution can be connected to Charging Station Management System - Schneider Electric or third party - and integrated into parking system managing user access, payment, and more.



EcoStruxure™ EV Charging Expert

Load Management System

- Dynamic distribution of available power among chargers
- On-peak/off-peak hours EV charging management

Watch the video

EVlink Pro AC

Wall-mounted or pedestal charging stations with possibility of metal enclosure

- Certified to the highest electrical standards
- Robust design for outdoor or indoor installations (IP55/IK10)
- Embedded precision metering (MID meters)
- RFID/NFC reader for user authentication
- Interoperability with supervision systems (OCPP 1.6-J)

Canalis™

Decentralized electrical distribution with trunking system for EV chargers for indoor parking

- Scalable system
- Easy access to protections (MCB and RCD)
- From 100 A to 1000 A
- Reduced installation time without power switch-off
- Cost-effective from the installation of 5 chargers

Customer benefits

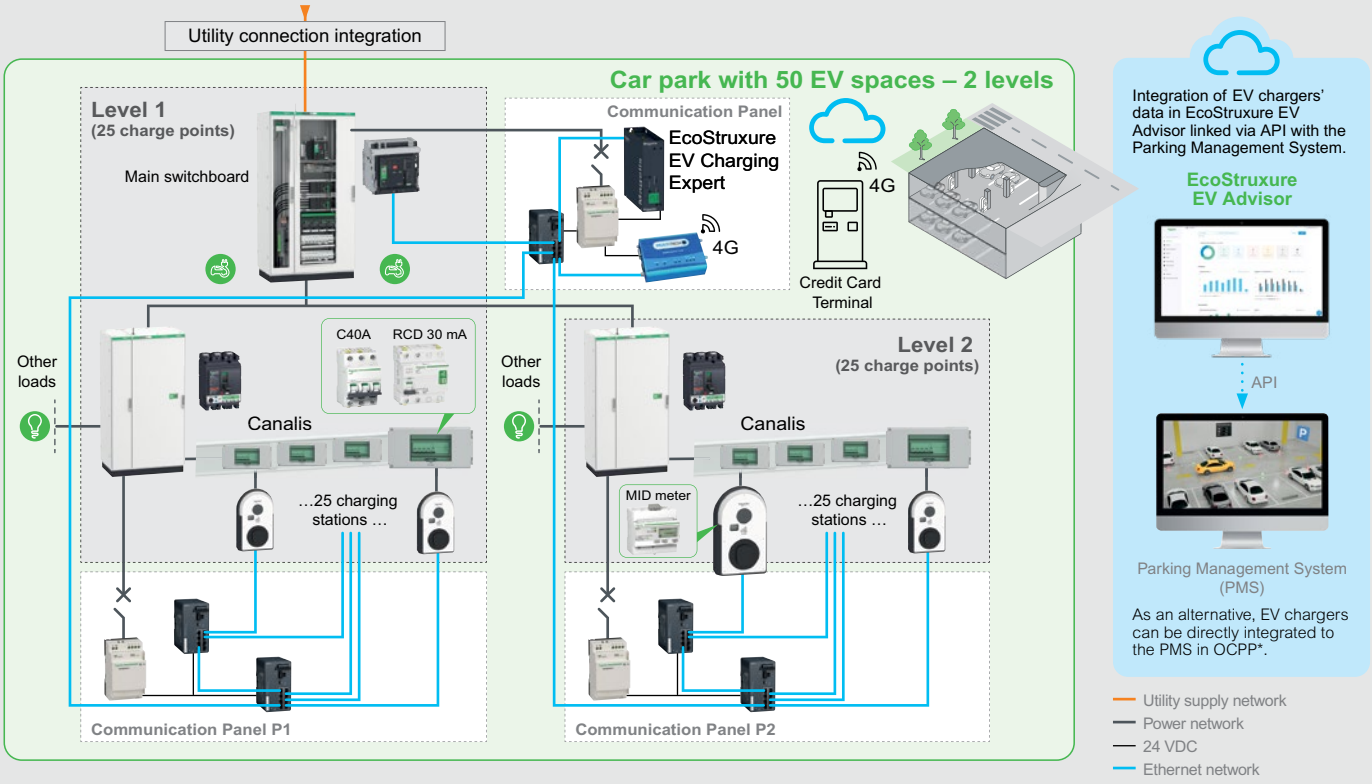
For car park owners:

- Compliance with local regulations
- Minimize development costs
- Offer an EV service as a path to sustainability
- Get a modular, flexible and scalable charging infrastructure ahead of future needs

For car park operators:

- Attract EV drivers and create an additional revenue stream
- Offer visitors a one-stop service
- Optimize power availability and reduce energy costs
- Integration with parking management system
- Get technical support and services for your EV infrastructure

Charging infrastructure for an underground car park with two EV zones



* Find out more details in our Design guide for Building applications.

eMobility for Fleets

Transition smoothly to an EV fleet and take the road to a more sustainable future

> "I want to electrify my fleet with minimal impact on my operations while investing wisely in a scalable EV charging infrastructure."

The EcoStruxure™ for Fleet application enables seamless integration of the electric vehicle charging infrastructure at home, at work and in transit. The solution enables Fleet Managers to optimize their total cost of ownership while increasing employee satisfaction.

1• Design the electrification journey

Consulting services

- Digital diagnostic or in-person analysis
- TCO, ROI, CO_2 emission impact evaluation
- Rollout plan for fleet electrification

EVlink Pro AC 7.4-22kW
wall-mounted or floor-standing

2• Implement the EV infrastructure

Project management through to commissioning

- Technical definition and infrastructure design
- Electrical distribution and charging station commissioning
- Test reports

Connected EVlink charging stations

- Intuitive user interfaces
- RFID/NFC reader
- Robust design for outdoor or indoor installations
- Interoperability with supervision systems (OCPP 1.6-J)
- IEC 61851 Ed.3, ISO 15118 ready

EVlink Pro DC 120-180kW
CCS Combo T2 or CHAdeMO

3• Operate easily with comprehensive services

EcoStruxure™ EV Advisor*

Remote supervision

- Remote monitoring, control, and trouble-shooting
- EV drivers' profile management
- Custom tariff setting (per site, user, schedule)
- Analytics and API capabilities

Services

- Start/Stop charging sessions
- Search for and book a charger
- Personal data management
- Charge at home kWh-price setting
- Help and hotline services
- Ad-hoc support and maintenance
- Continuous optimization (renewable energy, microgrid solution, cybersecurity enhancement)
- Access to public charge points

*Available soon in selected European countries

Customer benefits

For building owners and facility managers:

- Reduced development and installation costs
- Scalable and flexible design
- Open and ready for operation services
- Optimized power availability and reduced energy costs
- Compliant with local regulations

For fleet managers wanting to electrify their company fleet:

- Optimized CAPEX and ROI
- Lower Total Cost of Ownership
- Supported decision making and change-management processes
- Tracked usage for cost and CO_2 emission reduction
- Scale the EV fleet to your business needs

For EV fleet drivers:

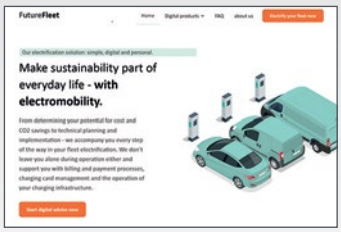
- Friendly user experience thanks to RFID card, dedicated driver's App, online and hotline support
- Automated reimbursement and billing management
- Quick and easy installation at home

End-to-end solution for fleets meeting sustainability and budget requirements

STEP 1: CONSULTANCY SERVICES
Analyze, plan, design and quote

Scalable and tailored support from small to large fleets

- Public information platform



- Online consulting tools

- Expert consultants

STEP 2: INFRASTRUCTURE IMPLEMENTATION
Build and install

Project and processes management

- Follow-up and coordination of project implementation through to commissioning
- Coordination of deliveries and suppliers
- Onboarding of chargers
- Test reports

Technical and infrastructure design

- Remote or on-site analysis
- Design of the infrastructure and architecture of the solution
- BOM and supplier definition

EcoStruxure™ for eMobility

APPS, ANALYTICS AND SERVICES

EDGE-CONTROL OFFERS

CONNECTED PRODUCTS

Schneider Electric digital innovation, at every level

STEP 3: OPERATION AND SERVICES
Operate and optimize investments

Efficient charge point operation

- Charge point operation and monitoring
- RFID/NFC reader and user management
- Customer services: support, trouble-shooting, maintenance and infrastructure enhancements
- Comprehensive charging experience

AT HOME

AT WORK

AT PUBLIC

Smart Charging solution

> "Smart Charging refers to a system which is able to monitor, manage and eventually control the use of EV charging devices with the aim of optimizing energy consumption."

As the adoption of EVs grows worldwide at a phenomenal rate, the estimates from BloombergNEF(1) are that 30% of vehicles are expected to be electric by 2030.

The expansion of the charging infrastructure will add complexity to the grids and will push the existing power distribution networks beyond their capacity, thus requiring expensive infrastructure upgrades.

To understand the need of **Smart Charging**, let's first look at some of the existing scenarios for EV charging setups:

In a scenario without any energy / load management setup, all plugged-in EVs start to charge simultaneously and at max power. The additional energy of EV charging on top of the normal building loads will result in overload and possibly exceed the Maximum Import Capacity (MIC). This could result in high fines or penalties from the grid operator.

To avoid the above scenario, standard load management practices are already adopted in most setups.

(1) BloombergNEF - Electric Vehicle Outlook 2022

Load management can be static or dynamic, meaning that a defined threshold (power limit) is set and only the remaining available power for EV charging is distributed among the connected EVs. Also, EVs can be charged at pre-defined times to optimize off peak electricity tariffs. These standard load management practices are sometimes effective but the growing adoption of EVs, which has increased the impact on the existing power distribution systems, provides a lot of scope to further optimize the EV charging infrastructure.

Smart Charging goes further than a standard load management setup.

It is an intelligent system with proactive logic to schedule and forecast, and therefore provides an optimal charging solution.

In a nutshell, each EV plugged into the charging station charges with a specific charging profile.

It not only takes into the account the needs of the EV driver (eg. Departure time etc.) but also respects the power limits of the entire installation.

On top of this, a smart charging system gives significant OPEX savings to the infrastructure owner by optimizing the locally generated renewable energy (eg. PV installation on the building) and using the dynamic electricity tariffs for cost efficient charging.

Benefits of Smart Charging

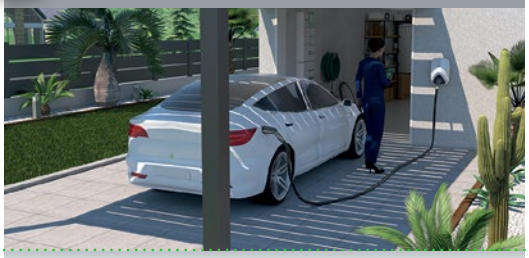
User requirement	Accommodate individual needs of EV drivers. For example, departure time, tariff preferences.
Infrastructure reliability	Integrate EV charging while keeping the MV/LV installations intact.
Dynamic energy tariffs	Savings in OPEX through price negotiation from multiple energy markets to balance supply and demand.
Renewable energy self consumption	Optimize self consumption of locally generated power. For example, PV installation on the building.

Learn more about Smart charging solutions

A smart charging solution is able to adapt, the charging strategy to both the needs of the user of the EV and the power grid in an intelligent and flexible way. Thus, a smart charging system will allow flexibility, optimized energy consumption, infrastructure scalability and cost efficiency.

eMobility solutions
Panorama per Applications

RESIDENTIAL
Single Family Home



BUILDINGS
Multifamily Home

APPS, ANALYTICS AND SERVICES

Wiser

eMobility Services

EcoStruxure™ EV Advisor*

EDGE CONTROL

EVlink Home anti-tripping system

EcoStruxure™ EV Charging Expert

CONNECTED PRODUCT

EVlink Home
EVlink Home Smart

EVlink Pro AC
EVlink Pro AC Metal

Electrical distribution for eMobility
From grid to EV

iMnx
Undervoltage release tripping unit

Acti9 A-Si type
Earth leakage protection

Canalis™ busbar trunking system
EVlink terminal distribution kit

*Available soon in selected European countries

FLEETS

At work

At destination

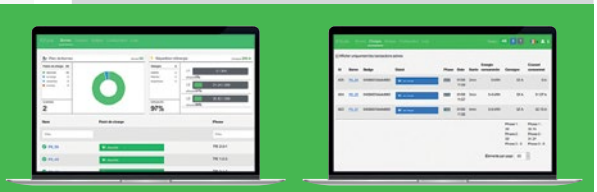
Everywhere

Maximize the performance of your EV infrastructure and keep your assets running in optimum condition throughout the whole lifecycle, from consulting through to modernization of your park of charging stations.

Remote supervision for installers, fleet operators, and charge point operators, to easily commission, monitor, and control the EV charging infrastructure.

A charging load management system that helps you to efficiently control your EV infrastructure and smartly distribute available power to your charging stations.

Load Management System



User interface

EVlink Pro AC
EVlink Pro AC Metal

EVlink Pro AC
EVlink Pro AC Metal
EVlink Pro DC 120-180kW

EVlink Pro AC
EVlink Pro AC Metal
EVlink Pro DC 120-180kW

iMnx
Undervoltage release tripping unit

iEM
Energy Meters

Acti9 A-SI type

Acti9 B type

ComPact NSX

Earth leakage and electrical protection

Images of the offers are not contractual.

LUA768
The Ultimate Driving Machine

EVlink™ Home and Home Smart

Electric Vehicle charging stations and accessories

EVlink™ Home ..... p. 26

EVlink™ Home Smart..... p. 28

Range accessories ..... p. 30

EVlink™ Home anti-tripping module ..... p. 31

Cables for EVlink™ Home and Pro AC ranges..... p. 46

EVlink™ Home

Characteristics

Charging station offer

- Charging power: 3.7 kW - 7.4 kW single-phase and 11 kW three-phase power supply
- Maximum charging current can be adjusted from 6 A to 32 A
- T2 socket outlet with or without shutter
- Attached cable (5m) with T2 connector

Power supply network

- 230V +/- 10% single-phase – 50 Hz +/- 10% for 3.7 and 7.4 kW charging stations
- 400V +/- 10% three-phase – 50 Hz +/- 10% for 11 kW charging stations
- Internal protection: 6 mA DC filter
- Suitable earthing systems: TT, TN-S, TN-C-S

Mechanical and environmental characteristics

- Ingress protection code: IP55 attached cable version; IP54 socket version
- Impact protection code: IK10
- Operating temperature: -30°C to +50°C
- Storage temperature: -40°C to +85°C
- Relative humidity 5% to 95%
- Altitude < 2000 m
- Attached cable length: 5 m for versions supporting it
- Dimension 282*409*148 mm / *11*16*6 in.* (without cable)
- Weight: 3.7 – 7.4 kW approx. 4.5 kg / 11 kW approx. 5.6 kg

Easy to install and commission

- Wall mounting

Energy Management

- Exclusive energy management options: real-time maximum charging current control (with the addition of an external anti-tripping system)
- Communication Power Line Carrier with Home Anti-tripping system

Access control modes

- Free access

Services offer

- Worldwide network of installers providing on-site installation and commissioning
- Worldwide customer care center

CE

Certification

EVlink Home has obtained the test certificate, establishing compliance with the IEC 61851-1 standard.

Standards

EN 61851-1 Ed3.0 (2019)

Green Premium™ Product

> ROHS compliant
> Reach compliant
> EoLi: End Of Life Process
> Product Environmental Profile compliant

Charging station references

EVlink Home

EVH4S03N2

EVlink Home					
References	Number of phases	Type of socket	Power kW	Output current	Embedded protection
With socket outlet					
EVH4S03N2	1PH	T2	3.7	16 A	with 6 mA DC filter
EVH4S07N2	1PH	T2	7.4	32 A	with 6 mA DC filter
EVH4S11N2	3PH	T2	11	16 A	with 6 mA DC filter
T2 with shutters					
EVH4S03N4	1PH	T2S	3.7	16 A	with 6 mA DC filter
EVH4S07N4	1PH	T2S	7.4	32 A	with 6 mA DC filter
EVH4S11N4	3PH	T2S	11	16 A	with 6 mA DC filter
With attached 5 m(1) cable and T2 connector					
EVH4S03NC	1PH	-	3.7	16 A	with 6 mA DC filter
EVH4S07NC	1PH	-	7.4	32 A	with 6 mA DC filter
EVH4S11NC	3PH	-	11	16 A	with 6 mA DC filter

EVlink Home with TIC*					
References	Number of phases	Type of socket	Power kW	Output current	Embedded protection
T2 with shutters					
EVH4S03N400F	1PH	T2S	3.7	16 A	with RDC-DD filter - TIC
EVH4S07N400F	1PH	T2S	7.4	32 A	with RDC-DD filter - TIC
EVH4S11N400F	3PH	T2S	11	16 A	with RDC-DD filter- TIC

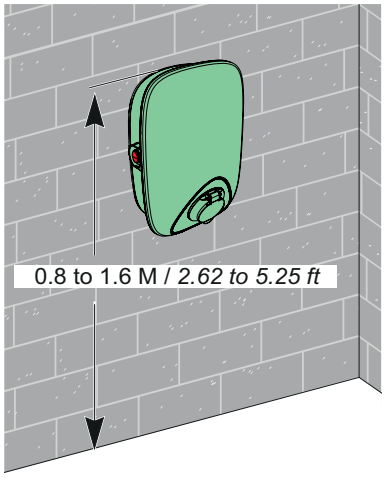
For France only : TIC- Anti-tripping module connected to the energy meter (Linky) ; compatible only with the TIC "Historic" mode.

Protections and options with EVlink Home

Description			
Charging	Single-phase		Three-phase
Rated Power - Current	3.7 kW - 16 A	7.4 kW - 32 A	11 kW - 16 A
Protection			
Circuit breaker (overcurrent) (1)	20 A Curve C	40 A Curve C	20 A Curve C
RCD (residual current) (1)	30 mA A-SI Type (2)	30 mA A-SI Type (2)	30 mA A-SI Type (2)
Under voltage tripping auxiliary (3)(4)	iMNX	iMNX	iMNX

(1) References to be defined and local availability to be checked by Schneider Electric front offices.
(2) In accordance with the electrical installation standard HD 60364-7-722:2016. Refer to local regulation.
(3)(4) iMNX is mandatory in case of charging station damage following a downstream short circuit.

Practical information



The charging station operates autonomously.
It has dedicated protective devices.

- Installation: by an electrician
- Location: residential, private usage

EVlink™ Home Smart

Coming soon

Characteristics

CE

Certification

EVlink Home has obtained the test certificate, establishing compliance with the IEC 61851-1 standard.

Standards

EN 61851-1 Ed3.0 (2019)

Green Premium™ Product

> ROHS compliant
> Reach compliant
> EoLi: End Of Life Process
> Product Environmental Profile compliant

Charging station offer

- Charging power: 3.7 kW - 7.4 kW single-phase and 11 kW three-phase power supply
- Maximum charging current can be adjusted from 6 A to 32 A
- T2 socket outlet with or without shutter
- Attached cable (5m) with T2 connector

Power supply network

- 230V +/- 10% single-phase – 50 Hz +/- 10% for 3.7 and 7.4 kW charging stations
- 400V +/- 10% three-phase 50 Hz +/- 10% for 11 kW charging stations
- Internal protection: 6 mA DC filter
- Suitable earthing systems: TT, TN-S, TN-C-S

Mechanical and environmental characteristics

- Ingress protection code: IP55 attached cable version; IP54 socket version
- Impact protection code: IK10
- Operating temperature: -30°C to +50°C
- Storage temperature: -40°C to +85°C
- Relative humidity 5% to 95%
- Altitude < 2000 m
- Attached cable length: 5 m for versions supporting it
- Dimension 282*409*148 mm / *11*16*6 in.* (without cable)
- Weight: 3.7 – 7.4 kW approx. 4.5 kg / 11 kW approx. 5.6 kg

Easy to install and commission

- Wall mounting
- eSetup Smart phone commissioning application (to pair with Home network)

Energy Management

- Energy management exclusive options: real-time maximum charging current control (with the addition of an external anti-tripping system)
- Delayed charging and current limitation can also be controlled by supervision or by the home management system (over OCPP)
- Interface with an external MID energy meter for consumption billing

Versatile Connection

- Communication Power Line Carrier with Home Anti tripping system
- OCCP 1.6J to connect to Wiser application
- Wi-Fi and Ethernet RJ45
- RS485 port serial Modbus for external MID meter

Smart Phone application

- Phone application to perform charge scheduling, and monitor charge consumption and the carbon footprint
- Interoperable with Schneider Electric Home Energy Management system to optimize home consumption.

Access control modes

- Free access

Services offer

- Worldwide network of installers providing on-site installation and commissioning
- Worldwide customer care center

Charging station references

EVlink Home Smart

EVH4A03N2

EVlink Home Smart					
References	Number of phases	Type of socket	Power kW	Output current	Embedded protection
With socket outlet					
EVH4A03N2	1PH	T2	3.7	16 A	with 6 mA DC filter
EVH4A07N2	1PH	T2	7.4	32 A	with 6 mA DC filter
EVH4A11N2	3PH	T2	11	16 A	with 6 mA DC filter
T2 with shutters					
EVH4A03N4	1PH	T2S	3.7	16 A	with 6 mA DC filter
EVH4A07N4	1PH	T2S	7.4	32 A	with 6 mA DC filter
EVH4A11N4	3PH	T2S	11	16 A	with 6 mA DC filter
With attached 5 m(1) cable and T2 connector					
EVH4A03NC	1PH	-	3.7	16 A	with 6 mA DC filter
EVH4A07NC	1PH	-	7.4	32 A	with 6 mA DC filter
EVH4A11NC	3PH	-	11	16 A	with 6 mA DC filter

EVlink Home Smart with TIC*					
References	Number of phases	Type of socket	Power kW	Output current	Embedded protection
T2 with shutters					
EVH4A03N400F	1PH	T2S	3.7	16 A	with RDC-DD filter - TIC
EVH4A07N400F	1PH	T2S	7.4	32 A	with RDC-DD filter - TIC
EVH4A11N400F	3PH	T2S	11	16 A	with RDC-DD filter - TIC

For France only : TIC- Anti-tripping module connected to the energy meter (Linky) ; compatible only with the TIC "Historic" mode.

Protection and options with EVlink Home Smart

Description			
Charging	Single-phase		Three-phase
Rated Power - Current	3.7 kW - 16 A	7.4 kW - 32 A	11 kW - 16 A
Protection			
Circuit breaker (overcurrent) (1)	20 A Curve C	40 A Curve C	20 A Curve C
RCD (residual current) (1)	30 mA A-SI Type (2)	30 mA A-SI Type (2)	30 mA A-SI Type (2)
Under voltage tripping auxiliary (3)(4)	iMNX	iMNX	iMNX

(1) References to be defined and local availability to be checked by Schneider Electric front offices.
(2) In accordance with the electrical installation standard HD 60364-7-722:2016. Refer to local regulation.
(3)(4) iMNX is mandatory in case of charging station damage following a downstream short circuit.

Wiser

A closer look at the Wiser application for EV owners

Create your own charging experience

Easy to sign up:

- Download Wiser on Appstore and Google Store
- Scan your charger QR code to pair your charger
- Select your car and your DSO

Power Management:

- Adapt charge to available power

Schedule and adapt:

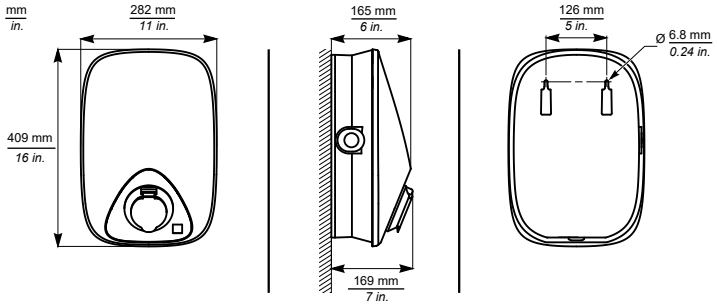
- Plan your charging time
- Adjust your energy mix
- Start the charge, and travel

History:

- Track your charging sessions and better understand the energy consumption related to your EV.

Range accessories

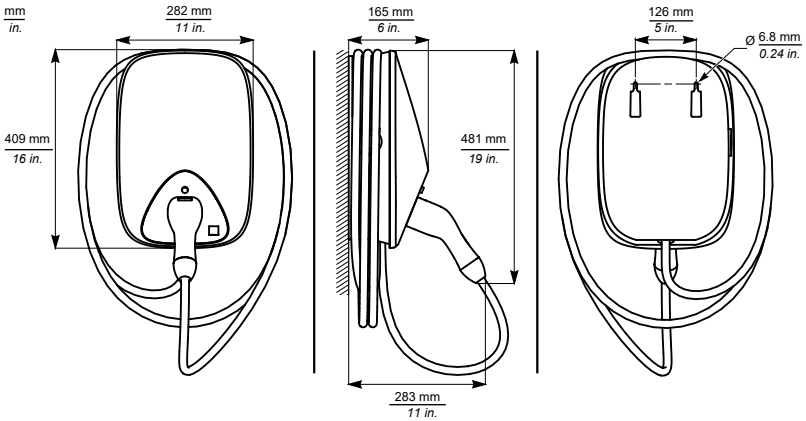
Charging stations dimensions



With socket outlets

≈ 4.5 kg (9.92 lb) - T2/T2S – 3.7 / 7.4 kW

≈ 5.6 kg (12.34 lb) - T2/T2S – 11 kW



With attached cable

≈ 8.8 kg (15.43 lb) – 3.7 / 7.4 kW

≈ 9.9 kg (17.63 lb) – 11 kW

Accessory references

EVlink Cable for T2 and T2S charging station

To connect the car to the charging station. Available in different lengths with a T2 connector.

Please refer to page 44

Additional information

Charging station technical document	Language	References
EVlink Home and EVlink Home Smart User Manual (1)	EN / FR / ES / DE	**GEX4292700**
EVlink Home anti-tripping system 1P User Manual (1)	EN / FR / ES / DE	**JYT9298700**
EVlink Home anti-tripping system 3P User Manual (1)	EN / FR / DE	**JYT4921902**
eSetup is an application for installers and electricians to commission EVlink Home Smart, It helps save time on installation and commissioning: everything can be done with an app and simple interface. Get a charge details report and maintenance report from the app.		

(1) Delivered with the product.

Download the above documents on Schneider Electric website.

EVlink™ Home anti-tripping module

Characteristics

1-phase Universal Peak Controller: EVA1HPC1

3-phase Universal Peak Controller: EVA1HPC3

Main function*

- Home Anti-tripping is a power load management system that adapts the power supplied to charge the car continuously, taking home consumption into account.
- The power availability is calculated by the Home Anti-tripping System by comparing the utility power limit and the home consumption gathered by a current transformer positioned on the bottom of the main circuit breaker.

Power supply network and electrical characteristics

- 220/230 V (+/- 10%) 50 Hz (+/- 10%)
- Rated power 4W
- Overvoltage category: III, Pollution degree: 2
- Insulation degree: reinforced insulation

Settings

Possible current value settings:

- 3P: 16A, 20A, 25A, 32A, 40A and 50A
- 1P: 16A, 20A, 25A, 32A, 40A and 50A

Communication

- Communication Power Line Carrier with EVlink Home range charging stations

Mechanical and environmental

- Dimension 70.4 x 93.2 x 68.8 mm
- Weight 196 g
- Mounting type: Top-hat rail mounting
- Nominal temperature -30°C to +50°C

Standards

- EN 61010-1-2010, EN 61326-1-2013

*According to the power available for the electrical installation, especially if the home is equipped with a heat pump. Minimum recommendation: 25A 3P+N.

EVlink™ Pro AC and Pro AC Metal

Electric Vehicle charging stations and accessories

EVlink™ Pro AC ..... p. 34

EVlink™ Pro AC Metal..... p. 38

Customization ..... p. 43

Range accessories and spare parts..... p. 44

Cables for EVlink™ Home and Pro AC ranges..... p. 46

EVlink™ Pro AC

Characteristics

Silver plated Socket-outlet Schneider Electric

E.V.READY

CE

PEP ecopassport®

Green Premium™ Product

> ROHS compliant
> Reach compliant
> EoLi: End Of Life Process
> Product Environmental Profile compliant

Certification

EVlink Pro AC has been certified according the IEC 61851-1 ed3.0 standard by the DEKRA certification body

Standards

IEC/EN 61851-1 Ed 3.0
IEC/EN 62196-1 Ed 2.0 - IEC/EN 62196-2 Ed 1.0
IEC 60364-7-722 Ed.2
EMC IEC 61851-21-2
EMC EN 301 489-1 V2.1.1 - EN 301 489-17 V3.1.1
Upgradable to ISO 15118 Plug and Charge
EV Ready / ZE Ready

Power supply network

- 220 - 240 V AC single-phase – 50/60 Hz for 7.4 kW charging stations
- 380 - 415 V AC three-phase – 50/60 Hz for 11 and 22 kW charging stations

Diagram of the earthing system

- TT, TN-S, TN-C-S
- IT (Compatible IT on 1-phase - some single-phase vehicles may require the addition of an isolation transformer; Compatible IT with additional isolation transformer on the 3-phase power supply)

Rated charging current

- T2S socket outlet with shutters and silver-plated contacts: 16 A to 32 A (factory setting: 32 A)
- TE or TF domestic socket-outlet: 10 A
- T2 attached cable, length 5 meters: 16 A to 32 A
- Socket-outlet on the front

Mechanical and environmental characteristics

- Ingress protection code: suitable for indoor and outdoor use
  - IP55 with T2S socket-outlet
  - IP55 with attached cable
  - IP54 with domestic socket
- Impact protection code: IK10
- Ambient air temperature for operation: -30°C to +50°C (+40°C for EVlink Pro AC with embedded RCD type Asi)
- Ambient air temperature for storage: -40°C to +80°C (+70°C for EVlink Pro AC with embedded RCD type Asi)
- Energy management options:
  - via digital inputs: limited current, postponed/suspended charge,
  - dynamic energy management combined with TIC interface with French utility meter or universal energy meter
- EV presence detection via digital input

Access control modes

- Free access
- User authentication through RFID or NFC badge
  - NFC 13.56 MHz reader compatible with type 1, 2, 4 and 5 badges
  - RFID reader:
    - conforming to ISO/IEC 14443 A and B and ISO/IEC 15693 protocols,
    - compatible with Mifare Ultralight, Mifare Classic, Mifare Plus

Embedded protection and metering

(depending on commercial references)

- Earth leakage protection: RDC-DD 6 mA + RCD type Asi 30 mA or RCD type B-EV
- Undervoltage tripping auxiliary MNx
- MID energy meter
- Metering board and CTs 1% accuracy

Easy to install and commission

- Wall mounting or floor standing
- 1 or 2 charging stations on the same pedestal
- Parameter setting through eSetup app via Bluetooth or EcoStruxure EV Charging Expert

Versatile connection to a supervision

- Wired Ethernet: 2 ports (1 for daisy chain)
- Connection through embedded or external 3G/4G modem as an accessory
- OCPP 1.6 Json Smart Charging interface

Services

- Worldwide customer care center
- Additional 1- or 3-year Warranty Extension
- On-site or remote commissioning support
- Services Plan
- Schneider Electric manufactured spare parts
- Advanced on-site training
- Worldwide network of partners providing on-site installation, commissioning and maintenance services

Charging station commercial references

EVlink Pro AC

Commercial references [1] [2][7]	Type of socket	Domestic socket	Output current	Power kW	Number of phases	Embedded protection	Embedded protection [4]	Protection supplied	Embedded MID meter [6]
EVB3S07NC0	Att T2 [5]	-	32 A	7.1	1PH	RDC-DD 6 mA	MNx	-	-
EVB3S07N40M	T2S	-	32 A	7.4	1PH	RDC-DD 6 mA	MNx	-	Yes
EVB3S07N40EM	T2S	TE	32 A	7.4	1PH	RDC-DD 6 mA	MNx	-	Yes
EVB3S07N4AM	T2S	-	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	Yes
EVB3S07N4EAM	T2S	TE	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	Yes
EVB3S07NCAM	Att T2 [5]	-	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	Yes
EVB3S07N4A	T2S	-	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S07N4EA	T2S	TE	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S07NCA	Att T2 [5]	-	32 A	7.4	1PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S07N4E1	T2S	TE	32 A	7.4	1PH	RDC-DD 6mA	-	-	-
EVB3S07N41	T2S	-	32 A	7.4	1PH	RDC-DD 6mA	-	-	-
EVB3S11N4A	T2S	-	16 A	11	3PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S11NCA	Att T2 [5]	-	16 A	11	3PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S11N4FB	T2S	TF	16 A	11	3PH	RCD B EV	MNx	-	-
EVB3S22NC0	Att T2 [5]	-	32 A	22	3PH	RDC-DD 6mA	MNx	-	-
EVB3S22N4	T2S	-	32 A	22	3PH	RDC-DD 6 mA	MNx	-	-
EVB3S22N4E	T2S	TE	32 A	22	3PH	RDC-DD 6 mA	MNx	-	-
EVB3S22N4A	T2S	-	32 A	22	3PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S22NCA	Att T2 [5]	-	32 A	22	3PH	RDC-DD 6 mA + RCD Asi 30 mA	MNx	-	-
EVB3S22N4EA	T2S	TE	32 A	22	3PH	RDC-DD 6 mA+ RCD Asi 30 mA	MNx	-	-
EVB3S22N4B	T2S	-	32 A	22	3PH	RCD B EV	MNx	-	-
EVB3S22NCB	Att T2 [5]	-	32 A	22	3PH	RCD B EV	MNx	-	-
EVB3S22N4EB	T2S	TE	32 A	22	3PH	RCD B EV	MNx	-	-
EVB3S22N4FB	T2S	TF	32 A	22	3PH	RCD B EV	MNx	-	-
EVB3S22N4E1	T2S	TE	32 A	22	3PH	RDC-DD 6mA	-	-	-
EVB3S22N41	T2S	-	32 A	22	3PH	RDC-DD 6mA	-	-	-
EVB3S22N40M	T2S	-	32 A	22	3PH	RDC-DD 6 mA	-	-	Yes
EVB3S22N40EM	T2S	TE	32 A	22	3PH	RDC-DD 6 mA	-	-	Yes
EVB3S22N40FM	T2S	TF	32 A	22	3PH	RDC-DD 6 mA	-	-	Yes
EVB3S22NC0M	Att T2 [5]	-	32 A	22	3PH	RDC-DD 6 mA	-	-	Yes
EVB3S22N40MR [3]	T2S	-	32 A	22	3PH	-	-	RCD B EV+MNx	Yes

1) Cable for T2S charger available as an accessory
(2) Includes 1 RFID badge
(3) Recommended for metallic charger, this specific charging station only measures the power consumption of the electric vehicle
(4) An MNx under voltage tripping auxiliary is mandatory in case of charging station damage following a downstream short circuit
(5) Attached cable with T2 connector
(6) MID certified energy meter, IEC accuracy class 1, B (active)
(7) All 3-phase references can be wired as 1-phase except those with embedded RCDs

Protections with EVlink Pro AC

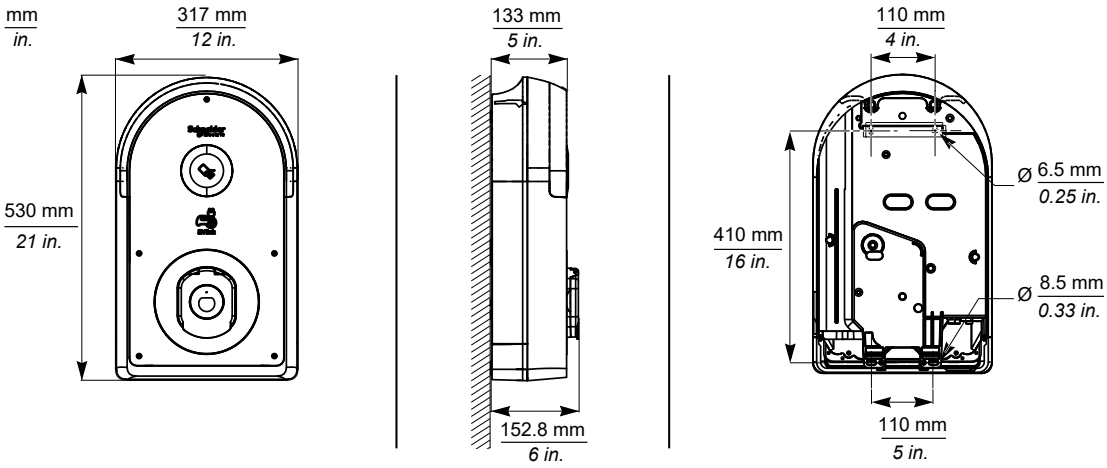
Description			
Charging	Single-phase	Three-phase	
Rated Power - Current	7.4 kW - 32 A [2]	11 kW - 16 A [2]	22 kW - 32 A [2]
Protection			
Circuit breaker (overcurrent) [1]	40 A Curve C	20 A Curve C	40 A Curve C
Delayed start			
Relay	With normally open contact [3]		
Temporary current limitation			
Relay	With normally open contact [3]		

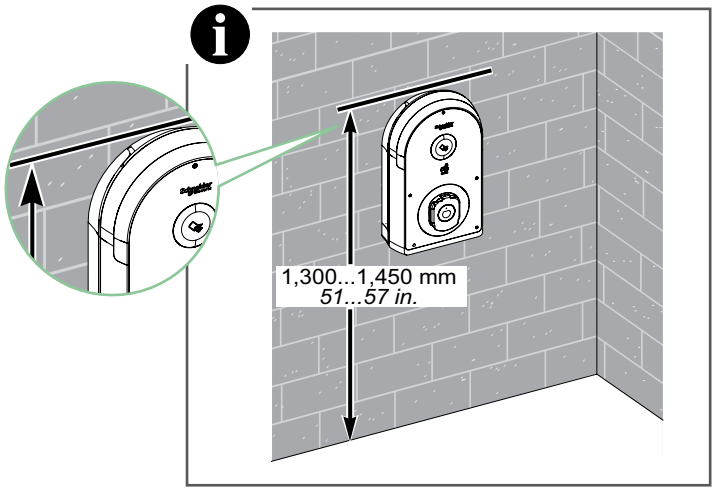
(1) References to be defined and local availability to be checked by Schneider Electric front offices.
(2) With or without domestic socket.
(3) EVlink Pro AC setting can be changed to "normally closed" if necessary, with the eSetup commissioning app.

Practical information

Practical information

EVlink Pro AC dimensions





Cable entry from above, below or through the wall

Watch the video

Watch all the videos

With T2S socket outlet	With T2 attached cable
≈ 7.2 kg (15.43 lb)	≈ 10 kg (22.05 lb)

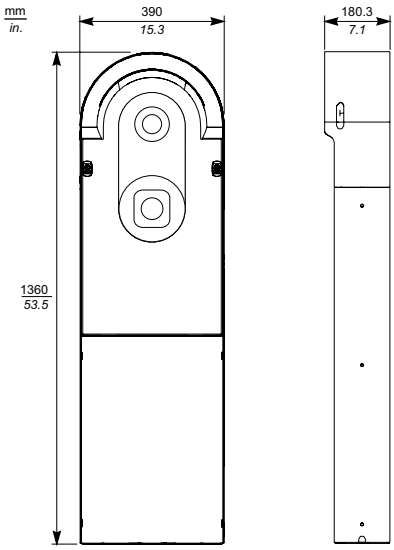
Additional information

Charging station technical document	Language	References
Installation Guide (1)	EN / FR	**NNZ1940301-00**
EVlink Pro AC troubleshooting guide	EN	**JYT6692101**
Technical specifications OCPP connectivity guide	EN	**GEX1969200**
EVlink Pro AC spare parts replacement	EN	**GEX2273501**
EVlink Pro AC spare parts replacement for Standards	EN	**GEX4591201**
Technical specifications MODBUS connectivity guide	EN	**GEX1969300**
EVlink Pro AC Preventive Maintenance guide	EN	**GEX8681300**
EVlink Pro AC Cybersecurity guide	EN	**GEX5261101**
eSetup is an application for installers and electricians to commission EVlink Pro AC. It helps to save time on installation and commissioning: everything can be done with an app and simple interface. Get a charge details report and maintenance report from the app.		

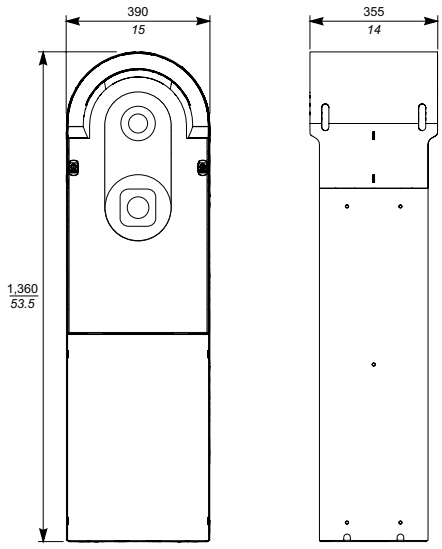
(1) Delivered with the product.

Download the above documents on Schneider Electric website.

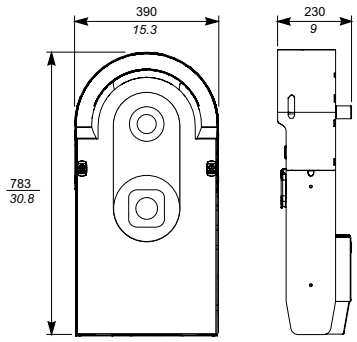
EVlink Pro AC Metal dimensions



FS1CP: floor standing 1 charge point



FS2CP : floor standing 2 charge points



WM1CP: wall mounted 1 charge point

EVlink Pro AC	Metallic kit
≈ 7.2 kg (15.43 lb)	WM1 CP ~ 26 kg (79.36 lb)
	FS 1CP ~ 40 kg (134.48 lb)
	FS 2CP ~ 61 kg (176.37 lb)

Watch the video

EVlink Pro AC Metal assembly time

EVlink Pro AC Metal	Average assembly time
Floor standing 2 charge points	90 to 110 min
Floor standing 1 charge point	50 to 70 min
Wall mounted 1 charge point	50 to 70 min

Additional information

Charging station technical document	Language	References
Installation Guides (1)	EN / FR	Instruction Guide EVlink Pro AC FS2CP: **JYT24397** Instruction Guide EVlink Pro AC FS1CP: **JYT24398** Instruction Guide EVlink Pro AC WM1CP: **JYT24399**
EVlink Pro AC trouble shooting guide	EN	**JYT6692101**
Electrical diagram guide	EN	**GEX2008002**
eSetup commissioning app		

(1) Delivered with the product.

Download the above documents on Schneider Electric website.

EVlink™ Pro AC Metal

Characteristics

> ROHS compliant
> Reach compliant
> EoLi: End Of Life Process
> Product Environmental Profile compliant

Standards

IEC/EN 61851-1 ed 3.0
EMC IEC 61851-21-2
IEC/EN 62196-1 ed 2.0
IEC/EN 62196-2 ed 1.0
Enclosures IEC/EN 60529

Extensive choice

Features

The EVlink Pro AC Metal charger is sold as a kit and it is available as:
- Wall mounted 1 charge point
- Floor standing 1 or 2 charge points

Design

The EVlink Pro AC Metal design enables any configuration and can be installed by a single person.
The necessary components for assembling the EVlink Pro AC Metal are the following:
1. A metallic kit enclosure:
   - wall mounted for 1 charge point or
   - floor standing for 1 charge point or
   - floor standing for 2 charge points
2. An EVlink Pro AC charger to be installed inside the metal enclosure
3. Optional: Kaedra enclosure and / or Thalassa enclosure(s) to be mounted inside the metal enclosure for hosting the electrical protection

Power supply network

- Same as EVlink Pro AC

Mechanical and environmental characteristics

- Same as EVlink Pro AC
- IP3X Metal enclosure
- IP65 Kaedra enclosure
- IP66 Thalassa enclosure

Access control modes

- Same as EVlink Pro AC

Services

- Worldwide customer care center
- Additional 1 or 3 years Warranty Extension
- On-site or remote commissioning support
- Services Plan
- Schneider Electric manufactured spare parts
- Advanced onsite training
- Worldwide network of partners providing on-site installation, commissioning and maintenance services

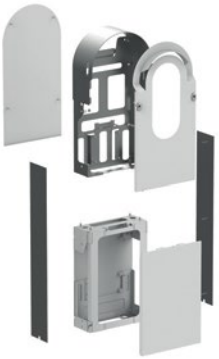
EVlink™ Pro AC Metal

EVlink Pro AC Metal selection criteria

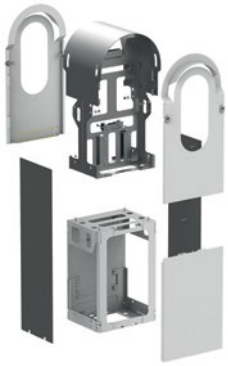
EVlink Pro AC metallic kits

All EVlink Pro AC charging stations can be assembled in any metallic kit.

EVA1RWKS1



EVA1RFKS1



EVA1RFKS2

Part number	Description
EVA1RWKS1	EVlink metallic kit for AC wall mounted 1 charge point
EVA1RFKS1	EVlink metallic kit for AC floor standing 1 charge point
EVA1RFKS2	EVlink metallic kit for AC floor standing 2 charge points

EVlink Pro AC with embedded MID meter

A specific EVlink Pro AC commercial reference is available to measure the power consumption of the electric vehicle only:

EVB3S22N40MR

Commercial references	Type of socket	Domestic socket	Current output	Power kW	Number of phases	Embedded protection	Protection supplied	MID inside
EVB3S22N40MR	T2S	-	32A	22	3PH	-	RCD B EV+MNx	Yes

Enclosures

Depending on the protection chosen to be embedded into the EVlink Pro AC Metal charger, the installation of an enclosure (Kaedra or Thalassa) may be necessary.
Refer to the configuration tables on the next pages.

Kaedra 13960

Thalassa EVA1RFKES

Part number	Description
Kaedra IP65 1 x 12 modules of 18 mm - 267 x 200 x 112 mm to install in the EVlink Pro AC metal WM 1CP or FS 1CP and 2 CP	
13979	No terminals
13960	T terminals
13444	T/N terminals
Thalassa to install in the EVlink Pro AC FS2CP base for one cable entrance up to 35 mm²	
EVA1RFKES	• 25 and 35 mm²- IP66 270x360x180mm • 1 Telequick plate • 2 DIN rail 240 mm max • 4 fixing brackets • Cable glands: 2xM32, 1xM12, 1x5G25/5G36

EVlink™ Pro AC Metal

EVlink Pro AC Metal selection criteria

Floor standing 1 charge point or Wall mounted 1 charge point

Designed to be handled, assembled and installed by only one person.

The necessary components for assembling the EVlink Pro AC Metal are the following:

- A metallic kit enclosure: wall mounted for 1 charge point or floor standing for 1 charge point
- EVlink Pro AC charger to be installed inside the metal enclosure
- Optional: Kaedra enclosure to be mounted inside the metal enclosure for hosting the electrical protection

EVlink Pro AC reference	Embedded in the EVlink Pro AC			To be installed in 1 Kaedra (optional)						To be installed in the distribution board		
	MID meter	MNx	RCD (7) per charge point	MNx	RCD (7) per charge point	SPD (1)	MCB control circuit (3)	RCD control circuit (8)	Terminal connector 25 mm²	MCB per charge point	RCD per charge point	SPD (1)
EVB3S22N40MR	1	-	-	1 Supplied (2)	1 B-EV Type Supplied (2)	-	1	1	-	1 (4)	-	1
EVB3S22N4A or EVB3S22N4B or EVB3S22NCA or EVB3S22NCB or EVB3S22N4EB or EVB3S22N4FB or EVB3S22N4EA	-	1	1 B EV or Asi Type	-	-	1	-	-	5 only if SPD	1 (4)	-	-
EVB3S22N40M or EVB3S22NC0M or EVB3S22N40EM or EVB3S22N40FM	1	-	-	1 Supplied (2)	1 Asi Type	1	-	-	-	1 (4)	-	-
EVB3S07N40M or EVB3S07N40EM	1	-	-	1 Supplied (2)	1 Asi Type	1	-	-	-	1 (6)	-	-
EVB3S22N4 or EVB3S22N4E or EVB3S22NC0	-	1	-	-	1 Asi Type	1	-	-	-	1 (4)	-	-
EVB3S07NC0	-	1	-	-	1 Asi Type	1	-	-	-	1 (6)	-	-
EVB3S11N4A or EVB3S11NCA	-	1	1 Asi Type	-	-	1	-	-	5 only if SPD	1 (5)	-	-
EVB3S11N4FB	-	1	1 B-EV Type	-	-	1	-	-	5 only if SPD	1 (5)	-	-
EVB3S07N4A or EVB3S07NCA or EVB3S07N4EA	-	1	1 Asi Type	-	-	1	-	-	3 only if SPD	1 (6)	-	-
EVB3S07N4AM or EVB3S07NCAM or EVB3S07N4EAM	1	1	1 Asi Type	-	-	1	-	-	3 only if SPD	1 (6)	-	-
EVB3S22N41 or EVB3S22N4E1	-	-	-	1	1 Asi Type	1	-	-	-	1 (4)	-	-
EVB3S07N41 or EVB3S07N4E1	-	-	-	1	1 Asi Type	1	-	-	-	1 (6)	-	-

(1) Optional. Surge Protection Device (SPD): a lightning strike near a building or overhead supply lines suddenly increases the voltage from 230 V to 3 or 6 kV which might destroy electronic components. Our surge protection devices can damp the spike down to approximately 15 kV which is the value most connected appliances can withstand. It helps to reduce damage to your valuable possessions by installing surge protection devices. One surge arrester per socket is recommended for high keraunic levels, or mandatory if required by local regulations
(2) Supplied with EVlink Pro AC
(3) MCB (miniature circuit breaker) for control circuit protection: 1P+N 4 A C 6 kA/10 kA
(4) MCB per charge point: 3P+N 40 A C 6 kA/10 kA
(5) MCB per charge point: 3P+N 20 A C 6 kA/10 kA
(6) MCB per charge point: 1P+N 40 A C 6 kA/10 kA
(7) RCD residual current device 30 mA type Asi or type B EV
(8) RCD control circuit: 1P+N 25 A 30 mA type AC; mandatory for TT network; strongly recommended for TNC / TNS network

EVlink Pro AC Metal selection criteria

Floor standing 2 charge points 1 cable entrance

Designed to be handled, assembled and installed by only one person.

The necessary components for assembling the EVlink Pro AC Metal are the following:

- A metallic kit enclosure: floor standing for 2 charge points
- An EVlink Pro AC charger to be installed inside the metal enclosure
- Optional: Kaedra enclosure and/or Thalassa enclosure(s) to be mounted inside the metal enclosure for hosting the electrical protection

EVlink Pro AC reference	Embedded in the EVlink Pro AC			To be installed in 2 Kaedra (optional)						To be installed in Thalassa		To be installed in the distribution board
	MID meter	MNx	RCD (12) per charge point	MNx	RCD (12) per charge point	SPD (1)	MCB per charge point	MCB control circuit (7)	RCD control circuit (8)	Terminal connector 25 mm²	SPD (1)	Terminal connector 35 mm²	MCB per charge point
2 x EVB3S2240MR	2	-	-	2 Supplied (2)	2 Supplied (2)	-	2 (4)	2	2	2	1	5	1 (9)
2 x EVB3S22N40M or EVB3S22NC0M or EVB3S22N40EM or EVB3S22N40FM	2	-	-	2 Supplied (2)	2 Asi Type	-	2 (4)	-	-	2	1	5	1 (9)
2 x EVB3S07N40M EVB3S07N40EM	2	-	-	2 Supplied (2)	2 Asi Type	-	2 (6)	-	-	2	1	3	1 (9)
2 x EVB3S22N4 or EVB3S22N4E EVB3S22NC0	-	2	-	-	2 Asi Type	-	2 (4)	-	-	2	1	5	1 (9)
2 x EVB3S07NC0	-	2	-	-	2 Asi Type		2 (6)	-	-	2	1	3	1 (11)
2 x EVB3S22N4A or EVB3S22N4B or EVB3S22NCA or EVB3S22NCB or EVB3S22N4EB or EVB3S22N4FB EVB3S22N4EA	-	2	2	-	-	-	2 (4)	-	-	-	1	5	1 (9)
2 x EVB3S11N4A or EVB3S11NCA or EVB3S11N4FB	-	2	2	-	-	-	2 (5)	-	-	-	1	5	1 (10)
2 x EVB3S07N4A or EVB3S07NCA or EVB3S07N4EA	-	2	2	-	-	1	2 (6)	-		3	-	-	1 (11)
2 x EVB3S07N4AM or EVB3S07NCAM or EVB3S07N4EAM	2	2	2	-	-	1	2 (6)	-	-	3	-	-	1 (11)
2 x EVB3S22N41 or EVB3S22N4E1	-	-	-	2	2 Asi Type	-	2 (4)	-	-	2	1	5	1 (9)
2 x EVB3S07N41 or EVB3S07N4E1	-	-	-	2	2 Asi Type	-	2 (6)	-	-	2	1	3	1 (11)

(1) Optional. Surge Protection Device (SPD): a lightning strike near a building or overhead supply lines suddenly increases the voltage from 230 V to 3 or 6 kV which might destroy electronic components. Our surge protection devices can damp the spike down to approximately 15 kV which is the value most connected appliances can withstand. It helps to reduce damage to your valuable possessions by installing surge protection devices. One surge arrester per socket is recommended for high keraunic levels, or mandatory if required by local regulations.

(2) Supplied with EVlink Pro AC
(3) To ease the cabling, 1 Kaedra enclosure per charger is preferred
(4) MCB (miniature circuit breaker) per charge point: 3P+N 40 A C 6 kA/10 kA
(5) MCB per charge point: 3P+N 20 A C 6 kA/10 kA
(6) MCB per charge point: 1P+N 40 A C 6 kA/10 kA
(7) MCB control circuit: 1P+N C 4 A 6 kA/10 kA
(8) RCD control circuit: 1P+N 25 A 30 mA type AC; mandatory for TT network; strongly recommended for TNC / TNS network
(9) MCB charger: 4P 80 A C 10kA
(10) MCB charger: 3P+N 40 A C 6 kA/10 kA
(11) MCB charger: 2P 80 A C 15 kA
(12) RCD residual current device 30 mA type Asi or type B EV

EVlink™ Pro AC Metal

EVlink Pro AC Metal selection criteria

Floor standing 2 charge points dual cable entrance

Designed to be handled, assembled and installed by only one person.

The necessary components for assembling the EVlink Pro AC Metal are the following:

- A metallic kit enclosure: floor standing for 2 charge points
- An EVlink Pro AC charger to be installed inside the metal enclosure
- Optional: Kaedra enclosure and/or Thalassa enclosure(s) to be mounted inside the metal enclosure for hosting the electrical protection

EVlink Pro AC reference	Embedded in the EVlink Pro AC			To be installed in 2 Kaedra (optional)						To be installed in the distribution board		
	MID meter	MNx	RCD (7) per charge point	MNx	RCD per charge point	SPD (1)	MCB control circuit (4)	RCD control circuit (5)	Terminal connector 25 mm²	MCB per charge point	RCD per charge point	SPD (1)
2 x EVB3S22N40MR	2	-	-	2 Supplied (2)	2 Supplied (2)	-	2	2	2	2 (6)	-	2
2 x EVB3S22N40M or EVB3S22NC0M or EVB3S22N40EM or EVB3S22N40FM	2	-	-	2 Supplied (2)	2 Asi Type	2	-	-	2	2 (6)	-	-
2 x EVB3S07N40M EVB3S07N40EM	-	-	-	2 Supplied (2)	2 Asi Type	2	-	-	2	2 (8)	-	-
2 x EVB3S22N4 or EVB3S22N4Eor EVB3S22NC0	-	2	-	-	-	-	-	-	-	2 (6)	2 Asi Type	2
2 x EVB3S07NC0	-	2	-	-	-	-	-	-	-	2 (8)	2 Asi Type	2
2 x EVB3S22N4A or EVB3S22N4B or EVB3S22NCA or EVB3S22NCB or EVB3S22N4EB or EVB3S22N4FB EVB3S33N4EA	-	2	2	-	-	2	-	-	10	2 (6)	-	-
2 x EVB3S11N4A or EVB3S11NCA or EVB3S11N4FB	-	2	2	-	-	2	-	-	10	2 (7)	-	-
2 x EVB3S07N4A or EVB3S07NCA or EVB3S07N4EA	-	2	2	-	-	2	-	-	5	2 (8)	-	-
2 x EVB3S07N4AM or EVB3S07NCAM or EVB3S07N4EAM	2	2	2	-	-	2	-	-	5	2 (8)	-	-
2 x EVB3S22N41 or EVB3S22N4E1	-	-	-	2	2 Asi Type	2	-	-	-	2 (6)	-	-
2 x EVB3S07N41 or EVB3S07N4E1	-	-	-	2	2 Asi Type	2	-	-	-	2 (8)	-	-

(1) Optional. Surge Protection Device (SPD): a lightning strike near a building or overhead supply lines suddenly increases the voltage from 230 V to 3 or 6 kV which might destroy electronic components. Our surge protection devices can damp the spike down to approximately 15 kV which is the value most connected appliances can withstand. It helps to reduce damage to your valuable possessions by installing surge protection devices. One surge arrester per socket is recommended for high keraunic levels, or mandatory if required by local regulations.
(2) Supplied with EVlink Pro AC
(3) To ease the cabling, 1 Kaedra enclosure per charger is preferred
(4) MCB (miniature circuit breaker) for control circuit protection: 1P+N 4 A C 6 kA/10 kA
(5) RCD control circuit: 1P+N 25 A 30 mA type AC mandatory for TT network; strongly recommended for TNC / TNS network
(6) MCB per charge point: 3P+N 40 A C 6 kA/10 kA
(7) MCB per charge point: 3P+N 20 A C 6 kA/10 kA
(8) MCB per charge point: 1P+N 40 A C 6 kA/10 kA
(9) RCD residual current device 30 mA type Asi or type B EV

Customization

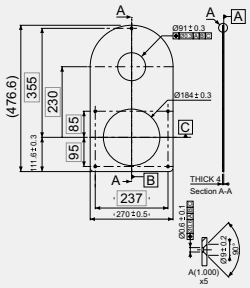
The EVlink Pro AC customization can be executed through local partners with the help of the product drawings below.

EVlink Pro AC

- The front plate can be customized.
- The material is PC BAYLOY 10 UV white 3.

EVlink Pro AC Metal

- The metallic enclosure can be customized.
- The material is electrogalvanized steel class C4M.



Schneider Electric provides the 2D plan with dimensions to produce the customized sticker se.com/EVlink.

Range accessories and spare parts

Accessories references

EVlink Pro AC and Pro AC Metal

4G Kits

4G embedded modem dedicated for architecture up to 10 EVlink Pro AC
- Cost-efficient solution for remote monitoring applications
- 1 device to manage wireless communication of up to 10 charging stations
- Compact and directly integrated inside the charging station.

Embedded 4G modem with 2 internal antennas for EVlink Pro AC.
Reference: **EVA1MS**

Embedded 4G modem with an external antenna for EVlink Pro AC Metal
Reference: **EVA1MM**

External modem for architecture with more than 10 EVlink Pro AC and/or EcoStruxure EV Charging Expert Manage wireless communication of large infrastructure and installation requiring load management.

External modem with antenna
Modem reference: **EVP3MM**
Antenna reference: **EVP2MX**

Pack of 10 RFID badges

For charging stations equipped with an RFID reader. The badges are supplied blank, ready to be programmed to identify an administrator or user. Sheet of adhesive labels for badges: 1 administrator + 9 users.
Reference: **EVP1BNS**

TIC interface

Energy management: Smart meter connection to Historical and Standard TIC Tele Information Client card EVlink interface with French utility meters.
Reference: **EVA1MTH**

EVlink Cable

To connect the car to the charging station. Available in different lengths with a T2 connector.

Please refer to page 46

EVlink Pro AC specific

Pedestal mounting pole

Floor standing:
- for 1 EVlink Pro AC,
  Reference: **EVA1PBS1**
  H 1300 x W 285 x D 229 mm
- for 2 EVlink Pro AC,
  Reference: **EVA1PBS2**
  H 1300 x W 285 x D 384 mm
- Plate to convert the pedestal for 1 charger to a pedestal for 2 chargers.
  Reference: **EVA1PCS2**

Permanent cable holder

To leave the cable connected to the charging station
Reference: **EVA1PLS1**

Accessories references

EVlink Pro AC Metal specific

Cable holder

Allows the cable to be left connected on the side charging station.
The cable holder is mandatory for charging stations with attached cable.
In case of charging station with socket, it can allow to lock the accessory cable.
Reference: **EVA1FWHS12**

Locking accessory for the metal kit

Polyamid handle lock, mainly for cybersecurity purpose, direct mounting on front plate.
1 cylindrical barrel, 2 keys Nr 610,
1 handle with key lock.
Reference: **NSYCL610CSX**
Quantity:
2 for WM1CP, or 2 for FS1CP,
or 4 for FS2CP

Spare part references

EVlink Pro AC front plate	Reference
	EVP1SS

EVlink Pro AC front plate with cut-out window	Reference
Designed with a cut-out window enabling to see the EVlink Pro AC MID meter.	**EVP1SM**

EVlink Pro AC and Pro AC Metal - Socket outlets		References
	1PH socket outlet T2S	**EVP1SSS41**
	3PH socket outlet T2S	**EVP1SSS43**
	1PH socket outlet T2S - Domestic Tx (not supplied)	**EVP1SSS51**
	3PH socket outlet T2S - Domestic Tx (not supplied)	**EVP1SSS53**
	TE domestic socket	**EVP1SSSE**
	TF domestic socket	**EVP1SSSF**

EVlink Pro AC and Pro AC Metal - Attached cables		References
T2 charging connector		
	32 A single-phase 5 m length	**EVP1CSS321C**
	32 A three-phase 5 m length	**EVP1CSS323C**

Cables for EVlink™ Home and Pro AC ranges

Characteristics

Type 2 (T2)

- Tested and certified product: Third-party laboratory CB certification (LCIE) complies with the applicable standard IEC 62196
- Fast charging (Mode 3)
- High-strength cable

Characteristics

- Length: available in 5, 7 and 10 m
- Max. current: 32 A
- Operating temperature: -30°C to +50°C
- Degree of protection: IP44.

Two good reasons to have a second EVlink cable in your electric vehicle

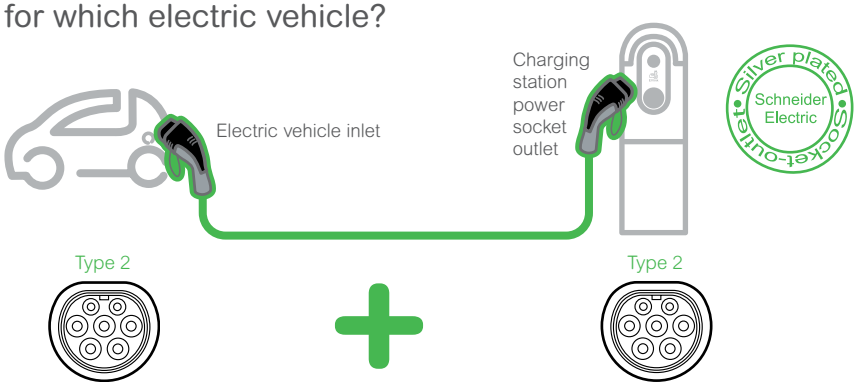
1. To take advantage of the charging capacity of public charging stations: by having an appropriate EVlink cable for the charging stations used, you obtain fast charging with integrated protection(1).

2. To have a fallback solution.

E.g. charging cable damaged or misplaced, or to help out another electric vehicle user.

Which EVlink cable

for which electric vehicle?



References	No. of phases		Charging power accepted (kW)				Cable length
	1	3	3.7	7.4	11	22	(m)
EVP1CNS32122	●		●	●			5
EVP1CNL32122	●		●	●			7
EVP1CNX32122	●		●	●			10
EVP1CNS32322		●	●	●	●	●	5
EVP1CNL32322		●	●	●	●	●	7
EVP1CNX32322		●	●	●	●	●	10

T2 + T2

(1) Learn more on the Wiki guide for Electric Vehicle charging

Schneider Electric
DC Meter A
DC Meter B
CCS2 A
CCS2 B
EVlink

EVlink™ DC Product Range

Electric vehicle charging stations

EVlink™ DC Fast Charge ..... p. 50

EVlink™ Pro DC 120-150-180 kW p.52

EVlink™ DC Fast Charge

In short

Standards

- EV international standard: EN 61851-1 Ed. 3
- Immunity for industrial environments: EN 61000-6-2 - sept. 2015
- Emissions for industrial environments: EN 61000-6-4 - 2017 + A1: 2011
- EMC for industrial environments: Class A
- EV ready for AC output of the 3 connector versions

DC 24 kW - 1 connector / single standard

DC 24 kW - 2 or 3 connectors / multiple standards

DC 24 kW stations are able to charge an electric vehicle in less than 1 hour. The range covers a large variety of needs with a choice of either, per station:

- 1 connector, CHAdeMO or CCS Combo 2
- 2 connectors, CHAdeMO + CCS Combo 2
- 3 connectors, CHAdeMO + CCS Combo 2 + AC Type 2S (front socket outlet with shutter, for AC current with simultaneous charging AC + DC)

Communication with dual modem for separate operation and maintenance supervision.

Installation

- Indoor or outdoor
- Wall mounted, floor mounted with additional pedestal
- Installation in less than 2 hours (when supply the cable is already installed)

Maintenance

- Reduced maintenance as there is no air filter to replace and a robust design (IP55, IK10) for uptime optimization.

DC 24 kW - 1 connector / single standard

Communication with dual modem for separate operation and maintenance supervision.

DC 24 kW - 2 or 3 connectors / multiple standards

Charging stations are ideal solutions for shopping centers, restaurants, parking areas or for any work place or shared buildings.

Application

EVlink Fast Charge stations are designed to charge a vehicle rapidly: 80% of capacity charged in less than 1 hour.

Characteristics

EVD1S24T0H

+ Pedestal EVP1DB1LG

EVD1S24THB

+ Pedestal EVP1DB2LG

EVD1S24THB2

+ Pedestal EVP1DB2LG

Mechanical and environmental features

- Degree of protection: IP55 (except cordsets)
- Degree of mechanical protection: IK10
- Operating temperature: -25°C / +50°C (with derating above 35°C)
- Storage temperature: -25°C to 65°C
- Operating altitude: 2000 m max.
- Relative humidity: 10% to 95%

Power supply network and charging mode

- Power supply: 360 - 440 V, 3P + N + earthing, 50 Hz
- Nominal supply current: 38 A (42 A max.) for DC output all versions
- Nominal supply current: 32 A (35 A max.) for AC output (version with 3 connectors)

Direct current charging (all charging stations)

- Charging in Mode 4 (IEC 61851-23)
- Charging power: 24 kW
- Charging voltage/current: 200 to 530 VDC CCS Combo 2 / 150 to 500 VDC CHAdeMO, 1.5 to 65 A
- Protections: short circuit, overload; Residual Current Device on DC output; overheating, temperature regulated
- Cable length: Mono-standard 3.25 m, Multi-standard 3.25 m

Alternating current charging (3-socket charging station only)

- Charging in Mode 3 (IEC 61851-22)
- Charging power: 22 kW
- Charging voltage/current: 400 VAC / 32 A
- Protection: short circuit, overload; overheating, temperature regulated
- Charging voltage/current: 400 V ± 10% AC, 3P + N + earthing, 32 A max., with the front AC Type 2S socket outlet

Communication

- Wireless 3G/4G modem
- OCPP 1.6Json
- LAN/TCP IP protocol

User interfaces

- 7-inch touch screen
- RFID card reader

Dimensions (cabinet without socket / cable)

- Mono-standard wall mounted (mm): H 860 x L 507 x W 250
- Mono-standard on pedestal (mm): H 1533 x L 536 x W 336
- Multi-standard wall mounted (mm): H 1225 x L 507 x W 250
- Multi-standard on pedestal (mm): H 1835 x L 536 x W 336

Charging station references

EVlink DC Fast Chargers			
Power	Connector(s)	References	Weight (kg)
24 kW DC	CHAdeMO	**EVD1S24T0H**	**66**
	CCS Combo 2	**EVD1S24T0B**	**66**
	CHAdeMO + CCS Combo 2	**EVD1S24THB**	**93**
24 kW DC/22 kW AC	CHAdeMO + CCS Combo 2 + AC Type 2S	**EVD1S24THB2**	**93**

Pedestals		
For EVlink DC fast chargers	References	Weight (kg)
For EVD1S24T0H, EVD1S24T0B	**EVP1DB1LG**	**51**
For EVD1S24THB, EVD1S24THB2	**EVP1DB2LG**	**53**

EVlink™ Pro DC 120-150-180 kW

In short

Green Premium™ Product

> ROHS compliant
> Reach compliant
> EoLi: End Of Life Process
> Product Environmental Profile compliant

Standard compliance

EV international standard: EN 61851-1 Ed. 3 IEC/ EN 61851-23 – Ed. 1
EV connector international standard: IEC/EN IEC62196-1 & IEC62196-3
Immunity for industrial environment: EN 61000-6-2
Emission for industrial environment: EN 61000-6-4
EMC for industrial environment: Class A.
Radio certification
RFID/NFC: EN 300 330 V2.1.1
4G: EN 301 908 -13 V13.1.1
Wi-Fi: EN 300 328 V2.2.2 - EN 301 893
EMC radio Equipment
EN 301 489-1 V2.2.0
RFID/NFC: EMC EN 301 489-3 V2.1.1
4G: EMC EN 301 489-52 V1.1.0
Wi-Fi: EMC EN 301 489-17 V2.1.1

Charging station offer

EVlink DC Pro DC 120 – 150 - 180 kW charging stations are able to charge an electric vehicle in less than 30 minutes.
The range covers a large variety of needs with a choice of either, per station:

- 2 connectors, CCS Combo 2 + CCS Combo 2
- 2 connectors, CHAdeMO + CCS Combo 2

Pro DC 120 – 150 – 180 kW with 2 vehicle connectors is capable to charge one vehicle at full power or simultaneously two vehicles with dynamic power allocation. For instance, to charge one vehicle at 120 kW while charging another one at 60 kW at the same time.

Easy to install

- Indoor or outdoor
- Floor mounted
- Installation in less than 2 hours (when supply cable is already installed)

Mechanical and environment features

- Degree of protection: IP55
- Degree of mechanical protection: IK10 – IK08 for the screen
- Operating temperature: -30°C / +50°C (with derating above 50°C)
- Storage temperature: -40°C to 70°C
- Operating altitude: 2000 m max.
- Relative humidity: 5% to 95%
- Corrosion protection C3M
- Charge interrupt button
- Accessible to disable people

Access control modes

- Free Access
- User authentication through RFID or NFC badge
  - NFC 13,56 MHz reader compatible with type 1, 2, 4 and 5 badges
  - RFID reader:
    - conforming to ISO/CEI 14443 A & B and ISO/CEI 15693 protocols,
    - compatible with Mifare Ultralight, Mifare Classic, Mifare Plus
- Auto-charge (EV MAC address)
- QR code for CPO application

Services

- Worldwide Customer Care Centre
- Additional 1- or 3-years Warranty Extension
- Onsite commissioning support
- Services Plan
- Schneider Electric manufactured Spare parts
- Advanced training
- Worldwide network of Schneider Electric services representatives providing on-site installation, commissioning and maintenance services

Application

EVlink Pro DC 120 – 150 – 180 kW charging stations are recommended for vehicle depot and traffic application.

Characteristics

EVD1S120TBB
EVD1S150TBB
EVD1S180TBB

EVD1S120THB
EVD1S150THB
EVD1S180THB

Power supply network and charging mode

- Power supply: 380 - 400 V - 415 Vac +/- 10% 50/60 Hz
- Poles description: L1+L2+L3+N+PE

Direct current charging (all charging stations)

- Charging in Mode 4 (IEC 61851-23)
- Charging power:
  - CCS Combo 2 - 120 – 150 – 180 kW
  - CHAdeMO - 60 kW
- Charging voltage/current:
  - CCS Combo 2 - 150 to 1 000 VDC / 300 A Max
  - CHAdeMO 150 to 500 VDC / 125 A Max
- Standby power: 90 W
- Protection against overheating, temperature regulated
- Cable range: 3.6 m with cable management
- Efficiency 94.5% at nominal output power
- Power Factor ≥ 0.99 at nominal output power
- THDi ≤ 5% at nominal output power
- Acoustic noise: Variable under load: 0dB - 65dB at 1m in front of the charger

Embedded protection and metering

- MCB
- RCD on DC output
- SPD
- Metering: DC Meter class 1 (1% accuracy at full scale)

Diagram of the earthing system

- TT, TN-S, TN-C-S
- IT (Compatible IT on 1-phase ; Compatible IT with additional isolating transformer on the 3-phase power supply)

Versatile connection to a supervision

- Ethernet
- Wireless 4G modem
- Wi-Fi
- OCPP 1.6Json Smart Charging interface
- ISO15118 / DIN 70121
- LAN/TCP IP protocol

User interfaces

- 10-inch touch screen (multi-language support English, French, German, Norwegian, Spanish). Possibility to add additional language
- multi-color LED for status indication for each vehicle connector

Sensors

- Humidity sensor
- Door sensor
- Water ingress sensor

Dimensions (cabinet with Cable management)

- H 2291 x L 992 x W 833 mm (H 90.20 x L 39.06 x W 32.80 In.)

EVlink™ Pro DC 120-150-180 kW

Charging station references

EVlink Pro DC 120-150-180 W				
Power	Connector(s)	References(1)	Weight without power module	Weight with power module
120 kW DC	CCS Combo 2 + CCS Combo 2	**EVD1S120TBB**	**~406 kg / 896 lb**	**~466 kg / 1028 lb**
	CHAdeMO + CCS Combo 2	**EVD1S120THB**	**~406 kg / 896 lb**	**~466 kg / 1028 lb**
150 kW DC	CCS Combo 2 + CCS Combo 2	**EVD1S120TBB**	**~406 kg / 896 lb**	**~481 kg / 1061 lb**
	CHAdeMO + CCS Combo 2	**EVD1S120THB**	**~406 kg / 896 lb**	**~481 kg / 1061 lb**
180 kW DC	CCS Combo 2 + CCS Combo 2	**EVD1S120TBB**	**~406 kg / 896 lb**	**~496 kg / 1094 lb**
	CHAdeMO + CCS Combo 2	**EVD1S120THB**	**~406 kg / 896 lb**	**~496 kg / 1094 lb**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

Current information and protections

Current information and protections to use with EVlink Pro DC 120 - 150 - 180 kW				
Current				
Power		**120 kW**	**150 kW**	**180 kW**
	Rated current	**193 A**	**242 A**	**291 A**
	Max. current	**214 A**	**268 A**	**323 A**
Electrical protection				
	Circuit breaker (overcurrent)	**3P+N or 4P**	**3P+N or 4P**	**3P+N or 4P**
	References	**C25F4TM250* or C25F44V2501***	**C40F42D400**	**C40F42D400**
	Optional RCD protection (VigiPact)	**-**	**LV432465**	**LV432465**

*Optional RCD protection included.
Note: if there is plan to upgrade later (from 120 to 150 kW or 150 to 180kW...) already consider the protection sizings for DC 180kW.

Additional information

Charging station technical document	Language	References
Installation Guide(1)	EN	**GEX4300800**
Owner Guide	EN	**GEX4301000**
Technical specifications OCPP connectivity guide	EN	**DOCA0311**
EVlink Pro DC Cyber-security Guide	EN	**DOCA0310**

(1) Delivered with the product.

Download the above documents on Schneider Electric website.

Life Is On Schneider Electric
Charging stations
Slaves
Badges
Admin
EcoStruxure ™ EV Cha
GLOBAL
Zones and outlets
ZONES
All zones
1st Floor
1st Floor - North
1st Floor - South
2nd Floor
3rd Floor (VIP)
POWER OUTLETS
All power outlets
PowerMeter1
EXPORT TRANSACTIONS
INFORMATION
DASHBOARD
Station fleet
Stations 23
Charge points 39
available 32
charging 3
suspended by EV 1
suspended by system 1
faulted 2
not connected 0
unavailable 0
CHARGES
0
Cluster powe
Charges
Optimal
Reduced
Suspended
charging stations
local production
STATIONS
Name
Zone
Connecte
Station 17
2nd Floor - North-East
Station 18
2nd Floor - North-East
Station 19
2nd Floor - North-East
Station 20
2nd Floor - North-East
Station 21
2nd Floor - North-East
Station 22
2nd Floor - North-East
Station 23
2nd Floor - North-West
Station 24
2nd Floor - North-West
Station 25
2nd Floor - North-West
Station 26
2nd Floor - North-West

Energy management, software and digital services

Energy management ..... p. 58

EcoStruxure™ EV Charging Expert ..... p. 60

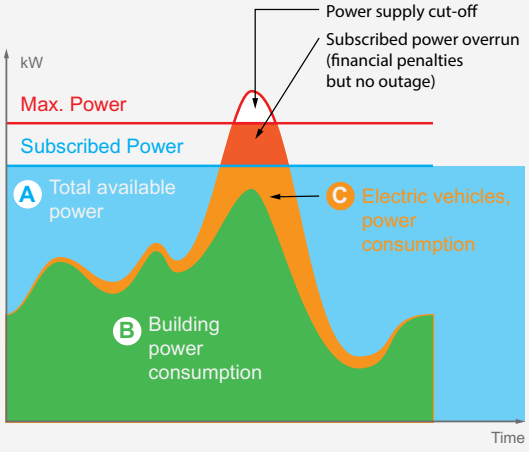
EcoStruxure™ EV Advisor ..... p. 66

Energy management

How to optimize the impact of the charging solution's consumption on an electrical installation

The problem

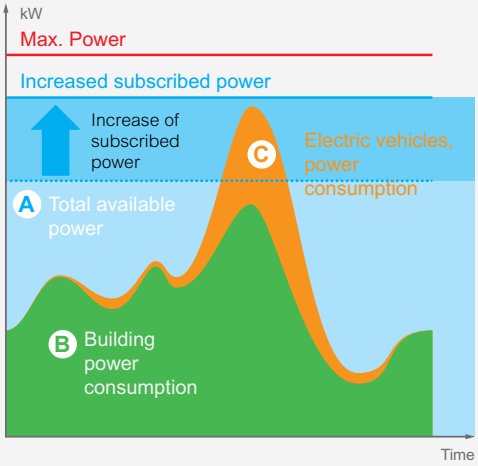
Initial situation



The installation of charging stations in an existing electrical installation can have a significant impact due to the power level required by electric vehicles to charge.

Solution without energy management

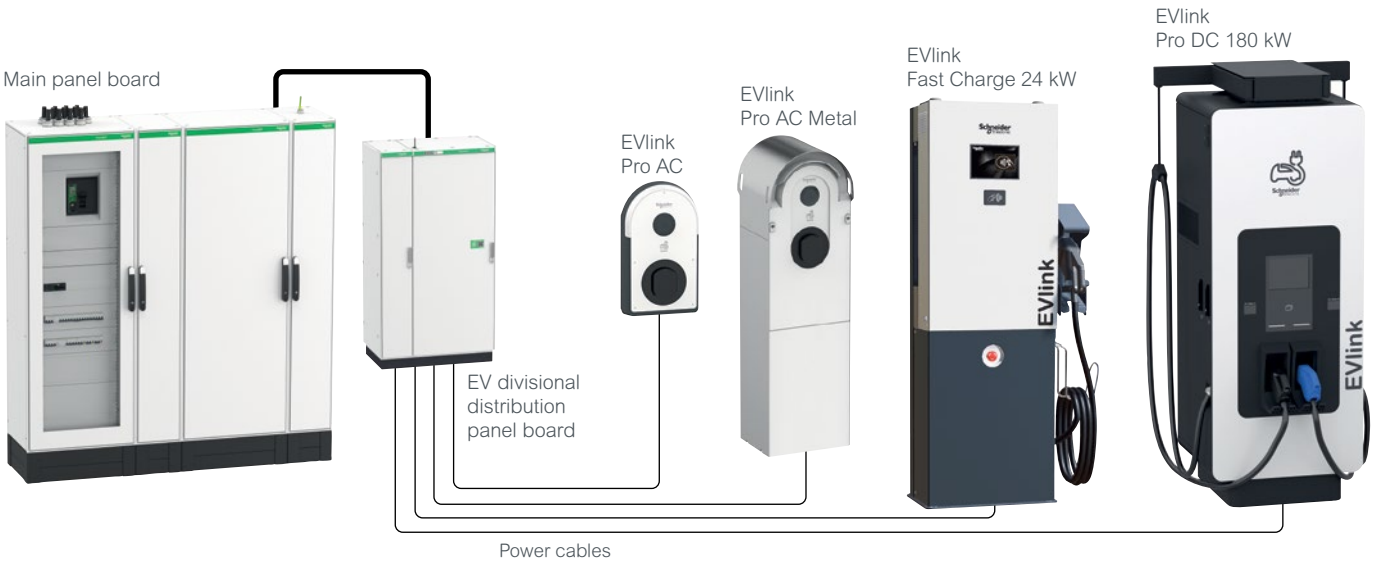
Increase in subscribed power



Watch the video

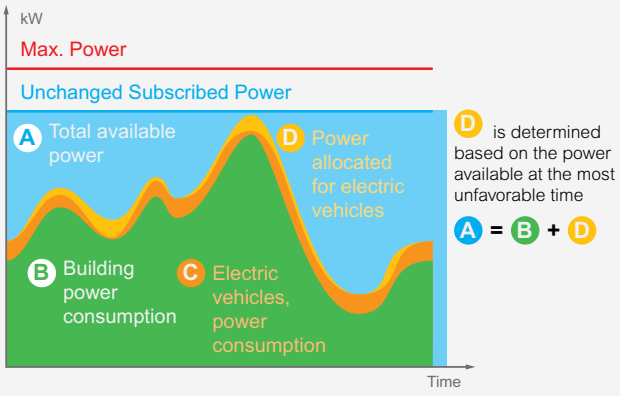
This solution consists of increasing the power subscribed to the energy supplier to maintain the same consumption model. It implies an increase in the cost of the subscription and the trigger threshold can be exceeded. Thus the continuity of service of the building could be impacted.

Electrical installation without energy management



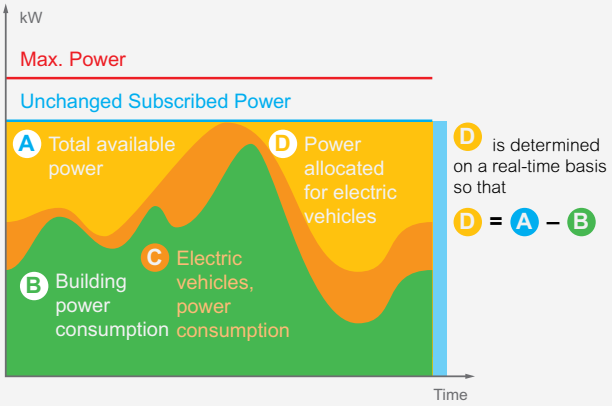
Schneider Electric solutions

Static energy management



Setpoint "D" is fixed. The power is distributed between all connected vehicles.

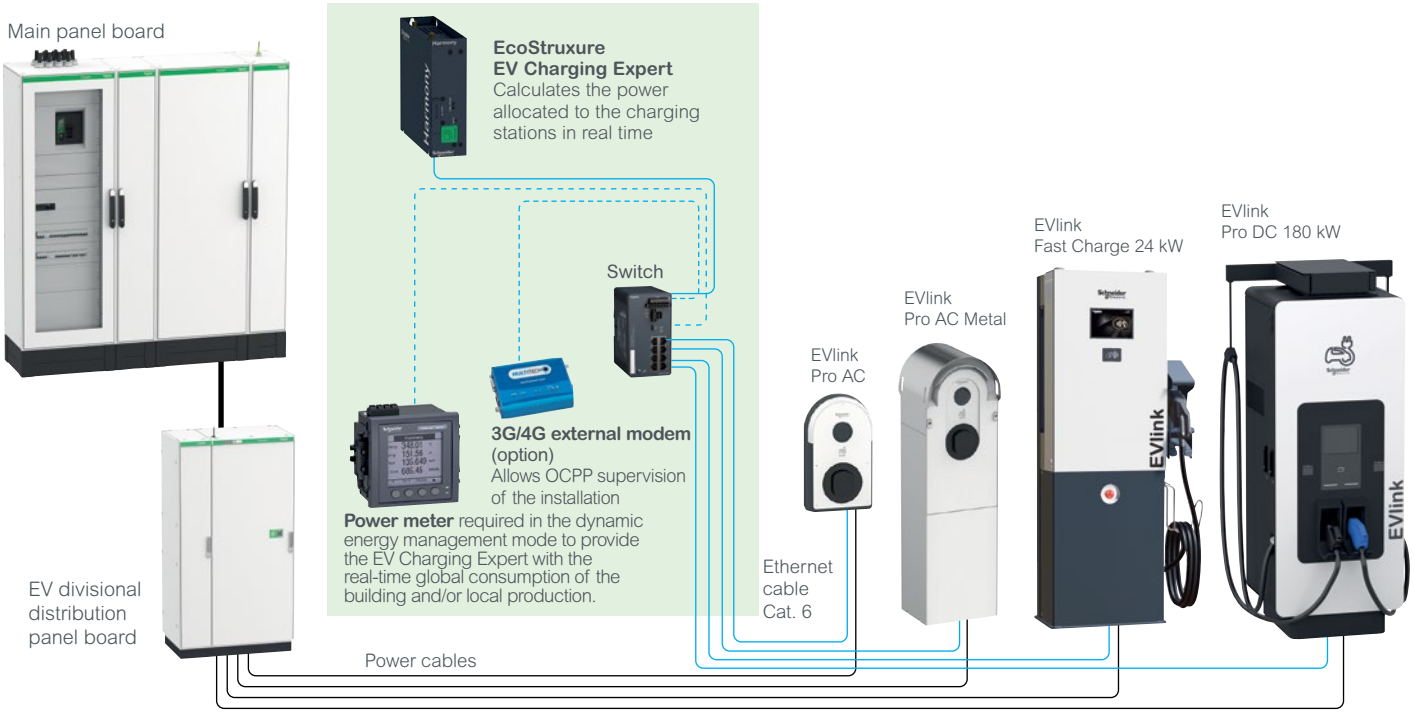
Dynamic energy management



Setpoint "D" is adjusted in real time according to the consumption of the rest of loads in the building, to maximize the power allocated to charging electric vehicles.

Electrical installation with energy management

From 1 to 100 charging stations depending on the EV Charging Expert model selected.



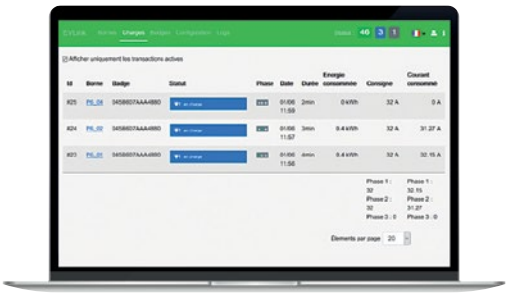
Discover more installation guidelines for EcoStruxure EV Charging Expert

EcoStruxure™ EV Charging Expert

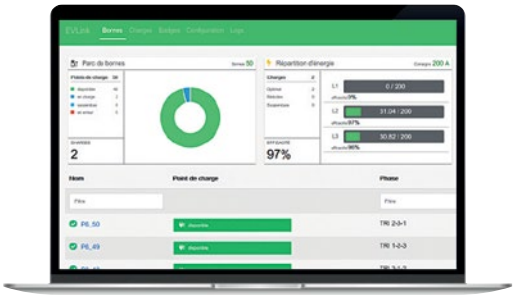
EcoStruxure EV Charging Expert

EV Charging Expert has been awarded with the prestigious "Solar impulse Efficient Solution" label.

Find out more here



Charging history of electric vehicles



Current charging sessions

EcoStruxure EV Charging Expert allows EV charging to be monitored, controlled and maximized based on the real-time available power in the building.

It helps to ensure the respect of cost and energy efficiency constraints of a set of charging stations by controlling their operation. The controller runs its management program according to the selected parameters and data received from the charging stations.

Characteristics

- PLC type: Harmony iPC IIoT Edge Box Core
- Operating system: Linux Yocto
- Supply voltage: 12...24 V DC
- Inrush current: 0.43 A
- Consumption: 16 W
- Dimensions: 150 x 46 x 157 mm
- Protection class: IP40
- Standards/Directives:
  - 2014/30/EU (electromagnetic compatibility)
  - 2014/35/EU (Low Voltage Directive)
  - Class A EN 55022 (electromagnetic compatibility, conducted and radiated emissions)
- Connections: 2 x USB 2.0, 1 x HDMI, 2 x Ethernet (10/100/1000 Mb/s), 1 x COM RS-232 (default), RS-232/422/485 (non-isolated), 1 ground connection, 1 x GPIO, 1 power supply connector 24 V DC

Connection to the charging stations

- Directly to the Ethernet LAN via a switch

External network connection

- Directly to the Ethernet LAN or remotely via a 3G or 4G modem
- Communication under OCPP 1.6 JSON (possible upgrade to OCPP 2.0)

Functions

- Calculates the power allocated to the charging stations
- Centralization and availability of data for each station

User interface

EcoStruxure EV Charging Expert provides access to an ergonomic and intuitive user interface (web server) to:

- remote start / stop a charging session
- reset or reboot a charging station
- visualize a dashboard indicating the status of each charging station
- manage badges (local addition, import or export badge list) and user rights
- access and export the history of charging data by station, by badge or aggregated for the infrastructure
- consult and export maintenance data.

To download the latest release of EcoStruxure EV Charging Expert software, please scan or click on the following QR code:

CORE references

		EcoStruxure EV Charging Expert with Static mode (dynamic load management with STATIC current setpoint)		EcoStruxure EV Charging Expert with Dynamic and Static modes (dynamic load management with DYNAMIC current setpoint, or STATIC current setpoint)			
References (1)		**HMIBSCEA53D1ESS**	**HMIBSCEA53D1ESM**	**HMIBSCEA53D1EDB**	**HMIBSCEA53D1EDS**	**HMIBSCEA53D1EDM**	**HMIBSCEA53D1EDL**
Features							
Capacity	Number of EVlink charging stations	15	50	5	15	50	100
Power management	Dynamic, with a STATIC current setpoint	●	●	●	●	●	●
	Time of use / DI	●	●	●	●	●	●
Multi zone	Maximum number of zones	1	10	2	2	10	20
	Maximum number of zone levels	1	3	2	2	3	3
Other loads	Power consumption reporting on other feeders	●	●	●	●	●	●
Badge management	VIP privilege user badge	●	●	●	●	●	●
Station management	VIP privilege charging station	●	●	●	●	●	●

(1) To upgrade from a current CORE reference to an upper-level one, consult the UPGRADES Software references bellow.

UPGRADES Software references

Upgrade from a CORE offer to an upper-level in case of increased number of charging stations in the infrastructure or load management mode change.

Reference	Description
EVLMSESS2ESM	Upgrade EV Charging Expert static from 15 to 50 charging stations
EVLMSEDB2EDS	Upgrade EV Charging Expert dynamic from 5 to 15 charging stations
EVLMSEDB2EDM	Upgrade EV Charging Expert dynamic from 5 to 50 charging stations
EVLMSEDB2EDL	Upgrade EV Charging Expert dynamic from 5 to 100 charging stations
EVLMSEDS2EDM	Upgrade EV Charging Expert dynamic from 15 to 50 charging stations
EVLMSEDS2EDL	Upgrade EV Charging Expert dynamic from 15 to 100 charging stations
EVLMSEDM2EDL	Upgrade EV Charging Expert dynamic from 50 to 100 charging stations
EVLMSESS2EDS	Upgrade EV Charging Expert 15 charging stations from static to dynamic
EVLMSESS2EDM	Upgrade EV Charging Expert from 15 charging stations static to 50 charging stations dynamic
EVLMSESM2EDM	Upgrade EV Charging Expert from 50 charging stations static to 50 charging stations dynamic
EVLMSESS2EDL	Upgrade EV Charging Expert from 15 charging stations static to 100 charging stations dynamic
EVLMSESM2EDL	Upgrade EV Charging Expert from 50 charging stations static to 100 charging stations dynamic

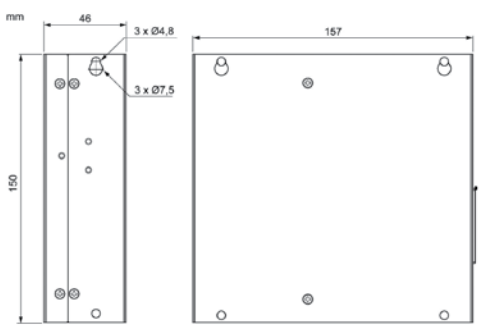
Additional information

Range compatibility:
EVlink Pro AC
EVlink Pro DC Fast Charge - 24 kW
EVlink Pro DC 120 -180 kW
EVlink Smart Wallbox
EVlink Parking

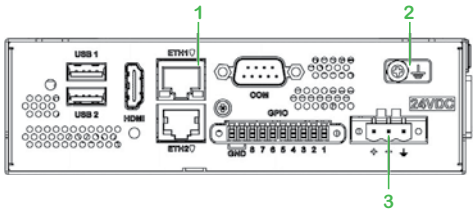
Practical information

EcoStruxure EV Charging Expert dimensions (mm)

Dimensions



Rear view



1- ETH1 (10/100/1000 Mbits/s)
2- Ground
3- DC supply

EcoStruxure™ EV Charging Expert

Features and benefits

Simplified, decentralized, flexible installation architecture

- EcoStruxure EV Charging Expert manages and controls up to 100 charging stations from one single controller and user interface dashboard
- It is available in different versions to adapt to the specific customer needs, whether this is for fewer than 5 charging stations, or to up to 100
- It allows several parking zones to be managed, each one with its own power metering for dynamic load management, and all of it from a single controller
- It is scalable, and allows the installation to be upgraded easily from a current model to a more sophisticated one if the customer's EV charging needs evolve
- It operates with open protocols (OCPP 1.6Json) facilitating integration with other systems
- It allows the execution of installations according to "EV/ZE Ready" standards
- It is available at most distributors.

Designed to be easily installed and commissioned by an installer

- Protection and control components to be installed in a Prisma panel or equivalent
- The webserver includes a configuration assistant that walks the installer through the different steps to configure the system
- Automatic scan and configuration of charging stations, all in parallel to save time
- Easy firmware updates, with the most recent firmware release available on se.com.

Multiple functionalities for efficient operation and maintenance

- Integrates the local supervision of charging stations and their power management in a single product
- Includes an intuitive dashboard interface to manage and control the installation
- Optimizes building continuity of service all while providing the highest possible EV charging capabilities in real time
- Distributes energy equitably among all electric vehicles while maximizing the power delivered to the charging stations and the number of vehicles that charge simultaneously
- Provides time-of-use electricity tariff scheduling to limit EV charging when the electricity price is high, and to maximize it when it is low (depending on the selected model)
- The electric vehicle driver can see that the charging of the car is active before leaving it (a new vehicle is always actively charging when just connected) and prioritize it, even when all the available power is already being distributed to other vehicles which have been connected longer
- Allows the management of user badges without having to subscribe to an additional supervision system
- Allows priority (VIP) user badges or charging stations to be defined. These will not be load-shed, or will only be load-shed when strictly necessary to ensure the building's power continuity (depending on the selected model)
- Registers all historic data related to the EV charging transactions for analytics, cost allocation or invoicing
- Does not generate any subscription cost (if the services of a Charge Point Operator are needed, EcoStruxure EV Charging Expert is compatible with a CPO backend system (OCPP 1.6J protocol))
- Offers integration capabilities as it communicates with the Building Management System (BMS) via a webservice (may require specific development)
- Major international manufacturer and world leader in eMobility.

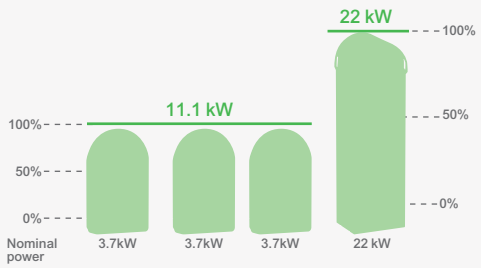
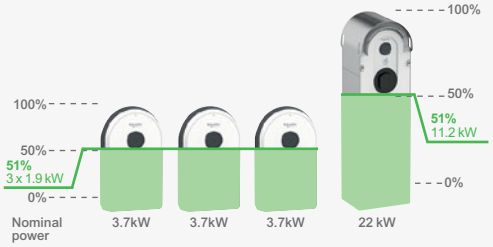
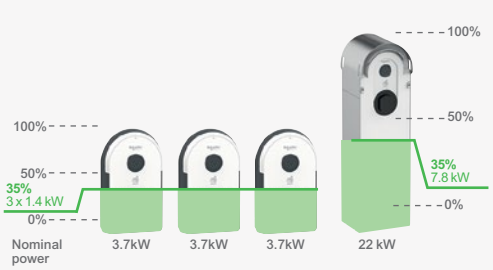
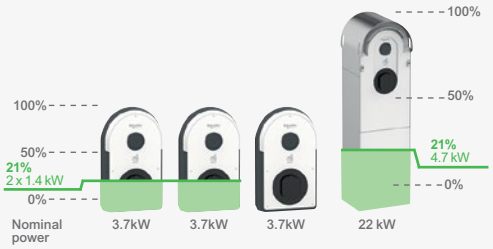
EcoStruxure EV Charging Expert has been awarded with the prestigious "Solar impulse Efficient Solution" label.

Find out more here

Operation

- EcoStruxure EV Charging Expert controls the EV charging infrastructure
- It allows the instantaneous power drawn by the entire set of connected electric vehicles to be limited, and manages the energy allocated to each one of them
- In real time, it transmits a setpoint to each charging station, which is transfered to the vehicles
- If the setpoint is exceeded, a decrease in energy is applied in the same way to all charge points (51% in the example with 17 kW of available power)
- Output is only reduced on the electrical phases that need it.

Descriptive example to illustrate the load reduction and load-shedding operation

Available power in the building allocated to EV charging	Delivered charging power	Description
33.1 kW		The full available energy is delivered.
17 kW		The energy will be delivered according to an equal percentage, in this example: 51%. **Details** 17 kW / 33.1 kW = 51%.
12 kW		When reaching the minimum current setpoint of a charge point, its current level will be maintained so that the EV keeps charging. **Details** Min. current for an EV to charge (according to IEC 61851) = 6 A, representing 1.4 kW of a 3.7 kW charging station. 12 - (3 x 1.4 kW) = 7.8 kW, that are provided by the 22 kW charging station.
7.5 kW		If there is not enough power to feed all the charging stations, charge point load shedding will be triggered, following the load-shedding rules. **Details** With 6 A (1.4 kW) per active charging station (IEC 61851 minimum current), the 7.5 kW of charging power are respected by switching off 1 charging station. 7.5 - (2 x 1.4 kW) = 4.7 kW, that are provided by the 22 kW charging station.

EcoStruxure™ EV Charging Expert

Principle of load balancing between vehicles

When the load shedding is triggered, the algorithm allows the available energy to be distributed according to 2 strategies (depending on the settings):

- Based on the energy already consumed: the system interrupts the charging of the vehicules that have obtained the highest amount of kWh since the start of their charging, favoring recently arrived vehicles.
- Based on the connection time: the system interrupts the charging of the vehicles with the longest charging time, favoring those last arrived.

In both cases, the system rechecks and updates the situation every 15 minutes.

Functions performed by all commercial references of EV Charging Expert

Access Management	Commissioning	Operation	Connectivity
Add, modify, delete, supervise badges	Commissioning all charging stations directly from EVlink LMS	Supervision through real-time dashboard and remote actions on charging stations	Connection with CPO supervision (OCPP 1.6 Json)
	Save and restore commissioned configuration	Charge data report export	Connection with EcoStruxure supervision (web services) (1)
		Maintenance report export	Optional: 3G/4G modem
			Commissioning by Ethernet cable

(1) May require specific development

Additional information

Charging station technical document	Language	References	
Installation Guides	EN	EcoStruxure™ EV Charging Expert Installation Guide: **DOCA0164**	
User Guides	EN	EcoStruxure™ EV Charging Expert User Guide: **DOCA0163**	Quick Start commissioning Guide **EVSOLQSC001EN**

Download the above documents on Schneider Electric website.

Refer to Appendix for detailed
> Switch details ..... p. 103
> Possible IT network topologies ..... p. 102
> Typical load management architectures ..... p. 104

EcoStruxure™ EV Advisor*

EcoStruxure EV Advisor is an eMobility management platform that enables seamless EV charging for fleets, buildings and destinations.
This SaaS offer is built to supply charge point operators, installers, building operators and fleet operators with everything they need to make their operation a successful venture.

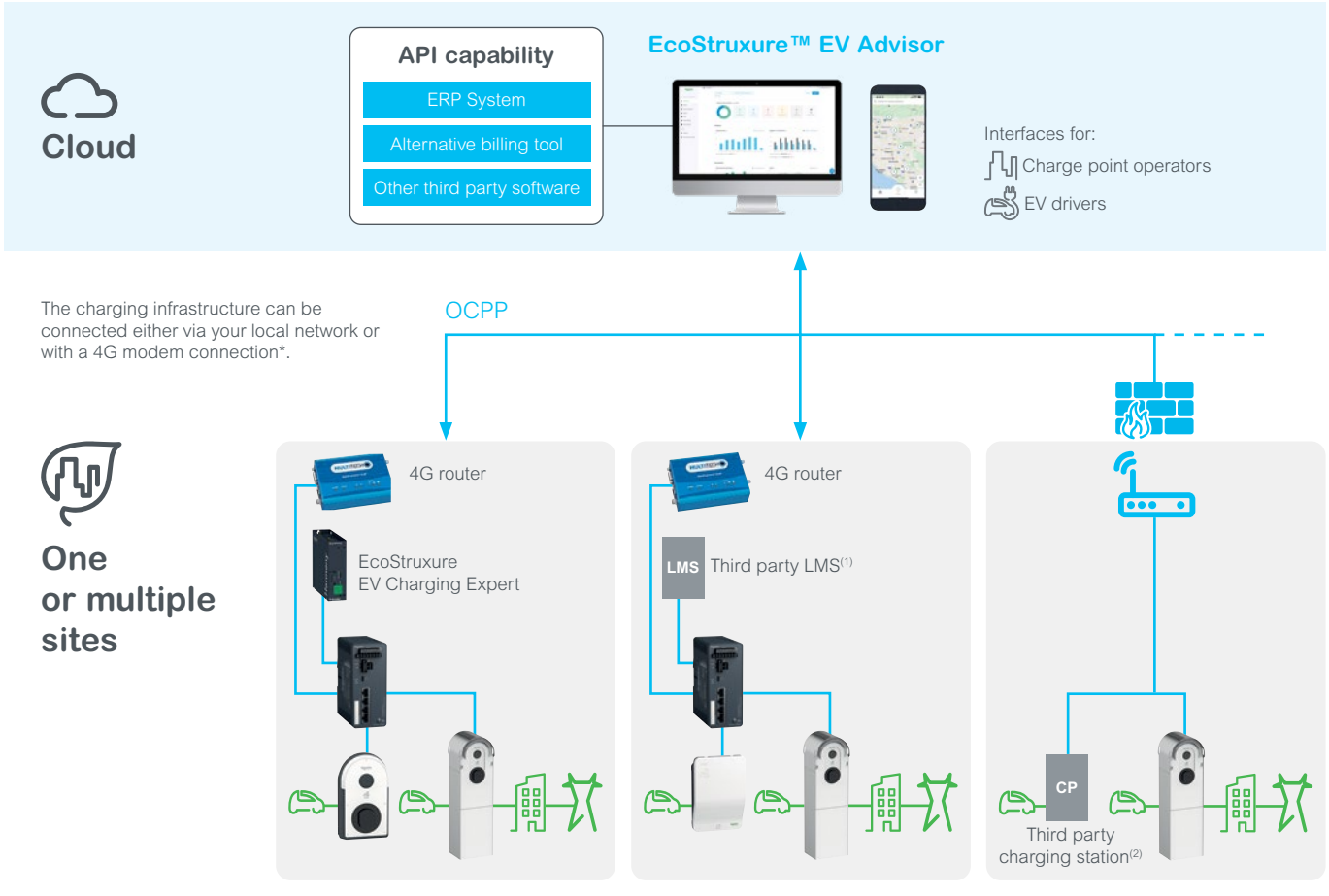
Users benefit from remote supervision and operation functions including features such as asset monitoring and asset control, cloud-based static load leveling, EV driver access management and pricing.
As an open cloud-based platform, EcoStruxure EV Advisor will help our customers make the most of their EV charging infrastructure and will support them in implementing their individual business case using Schneider or third-party manufacturer's hardware*.

This digital solution complements the eMobility portfolio and completes the EcoStruxure for eMobility offer.

Architecture

Whether you want to monitor a single site or manage an international network, with EcoStruxure EV Advisor you have flexibility to implement your individual business case.

With EcoStruxure EV Advisor, you can allocate access to the platform according to roles or responsibilities and share a log-in with your customers. For this purpose you can whitelabel the platform itself to promote your brand along with offering a whitelabeled EV Driver application.



(1) 4G data subscription is provided as option.
(2) Consult us to get the list of approved third party charging station manufacturers.
* Available soon in selected European countries

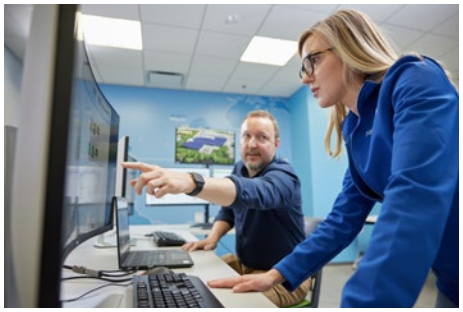
EcoStruxure EV Advisor meets your challenges

Optimize uptime

Monitor the charging stations' performance remotely and reduce downtime with the help of alerts and remote-control functions to minimize the time you have to spend on site.

Monitor your key performance indicators

Generate dashboards with specific insights into utilization, revenue and station health, and data related to sustainability such as greenhouse gas reduction.

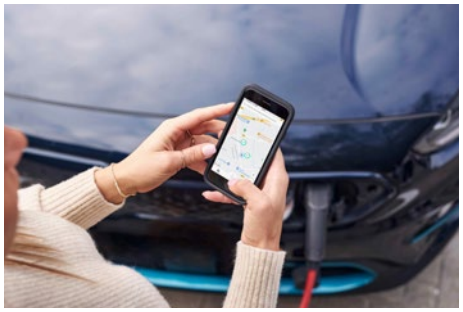


Avoid energy consumption peaks

Smartly manage the energy consumption of your EV infrastructure with our cloud-based load management tool.

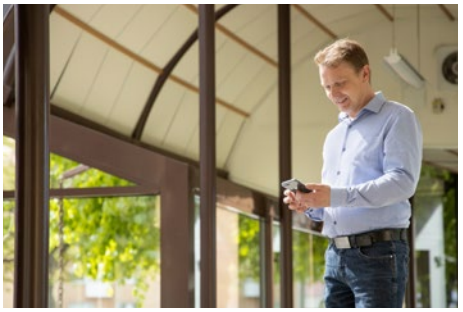
Profit from the integrated Billing Solution

Enroll RFID cards and give granular access.
Set a pricing scheme for your chargers.



User-friendly charging experience

The EV / Driver application helps drivers to start a charging session from their phone and to see what chargers they have access to.

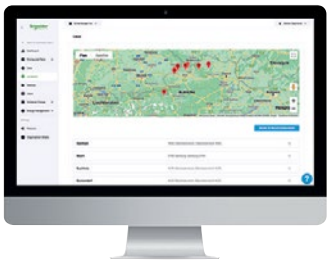


Control your EV charging history

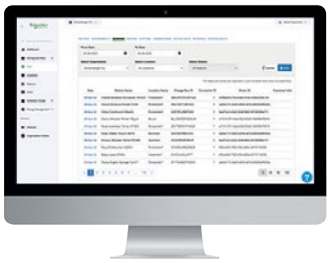
EV Drivers can track their usage in real-time and get detailed reports about their usage.

EcoStruxure™ EV Advisor

Features and benefits of EcoStruxure EV Advisor software



Site map



Detailed reports

Performance dashboard

Manage your EV charging infrastructure	• Monitor your charging infrastructure remotely and carry out remote maintenance and troubleshooting activities. • Manage access and permissions by specifying the rights of individuals or groups of EV drivers.
Generate revenues	• Set tariffs for charging events based on location, day of the week, time of day, parking time, consumption, number of charging events, and more.
Customize and implement your business case	• Develop your specific business case to suit your business activity. Manage a small number of locations or create your own network. • Manage user rights: grant view-only or editor rights to different users of the EV Advisor platform in your organization or give your customers limited access to, for example, dashboard and reports.
Optimize cost and grid usage	• Optimize EV infrastructure energy consumption with the static cloud energy management feature. • Monitor usage of the EV infrastructure to size and anticipate future needs through stats and dashboards.
Take advantage of an Open Platform	• Integrate the entire library of APIs to create a seamless customer experience. • Connect and integrate third party OCPP compliant hardware to leverage EV Advisor as a truly open platform.
Optimize EV drivers' user experience	• Provide the app to your EV drivers to enable them to find and unlock the charging stations, monitor their usage and review invoices. • Support awareness for your brand by whitelabeling the EV driver application.
Choose to become a network operator	• Set up multiple organizations and locations that can be monitored simultaneously. • Whitelabel the platform dashboard with your brand and allow your customers and partners to access certain areas of the platform. • Customized APIs supporting app development and other use cases including identity management, payment and CRM system integration. • Share your entire network of chargers with EV drivers to increase utilisation, your profitability and the EV driver experience.

Kl. 2
31,8 kJ
Bolesta
Schneider
Electric
BSD
BSD
Kl. 2
31,8 kJ

eMobility Services

eMobility Services ..... p. 71

How do I renew and design? ..... p. 72

Consulting ..... p. 72

How do I install and comission? ..... p. 74

Commissioning ..... p. 74

Warranty extension ..... p. 75

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eMobility Service Plan ..... p. 77

Spare parts ..... p. 78

How do I optimize? ..... p. 79

EcoStruxure EV Charging Expert upgrade ..... p. 79

EVlink Parking modernization ..... p. 79

Get in touch for support ..... p. 80

Customer Case Support ..... p. 80

Premium support ..... p. 80

Training ..... p. 81

A professional network ..... p. 82

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eMobility Services

Services over the entire lifecycle

Wherever you are in your eMobility adoption, we've got you covered!

Design your infrastructure

Let's partner up to design a sustainable and efficient eMobility charging solution for your electric fleet that suits your business needs, either for new projects or for upgrading your infrastructure, optimizing your installation with renewable energies, digital software, and management services.

Make your operation smarter

Efficiently manage your charging stations for optimized energy consumption and minimized carbon footprint while seamlessly monetizing your EV charging assets, which can be easily monitored and controlled through energy management capabilities.

Make the most of your new installation

Take advantage of our experts to optimize the performance of your EV infrastructure and keep your assets running in optimum condition throughout the whole lifecycle, from installation and commissioning, up to maintenance and modernization.

A professional network

Optimize uptime with the support of a network of certified experts for consulting, field, and remote services, trained and equipped with tools to execute on-site interventions and remotely diagnose and manage your eMobility assets.

Our 4 service values

Service-level agreement

By ordering a service contract, get advantage of an SLA, providing peace of mind by taking a better care for your EV Charging Infrastructure.

Personalized deal

Leverage a contract individually tailored to your requirements and conditions.

Increased lifespan of your equipment

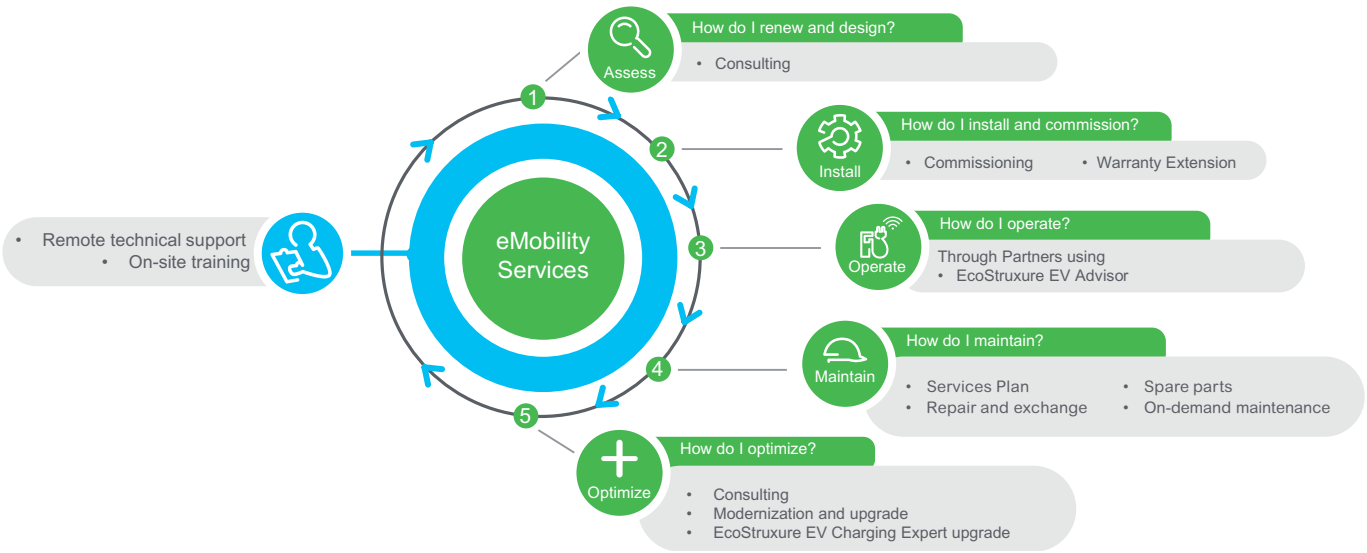
Extend the lifespan of your products and systems with preventive maintenance and services.

Schneider Electric expertise

Schneider Field Services representatives provide nationwide services with spare parts readily available for you.

eMobility Services

Improve productivity and minimize operational costs by reducing downtime throughout the entire lifecycle of your charging infrastructure.

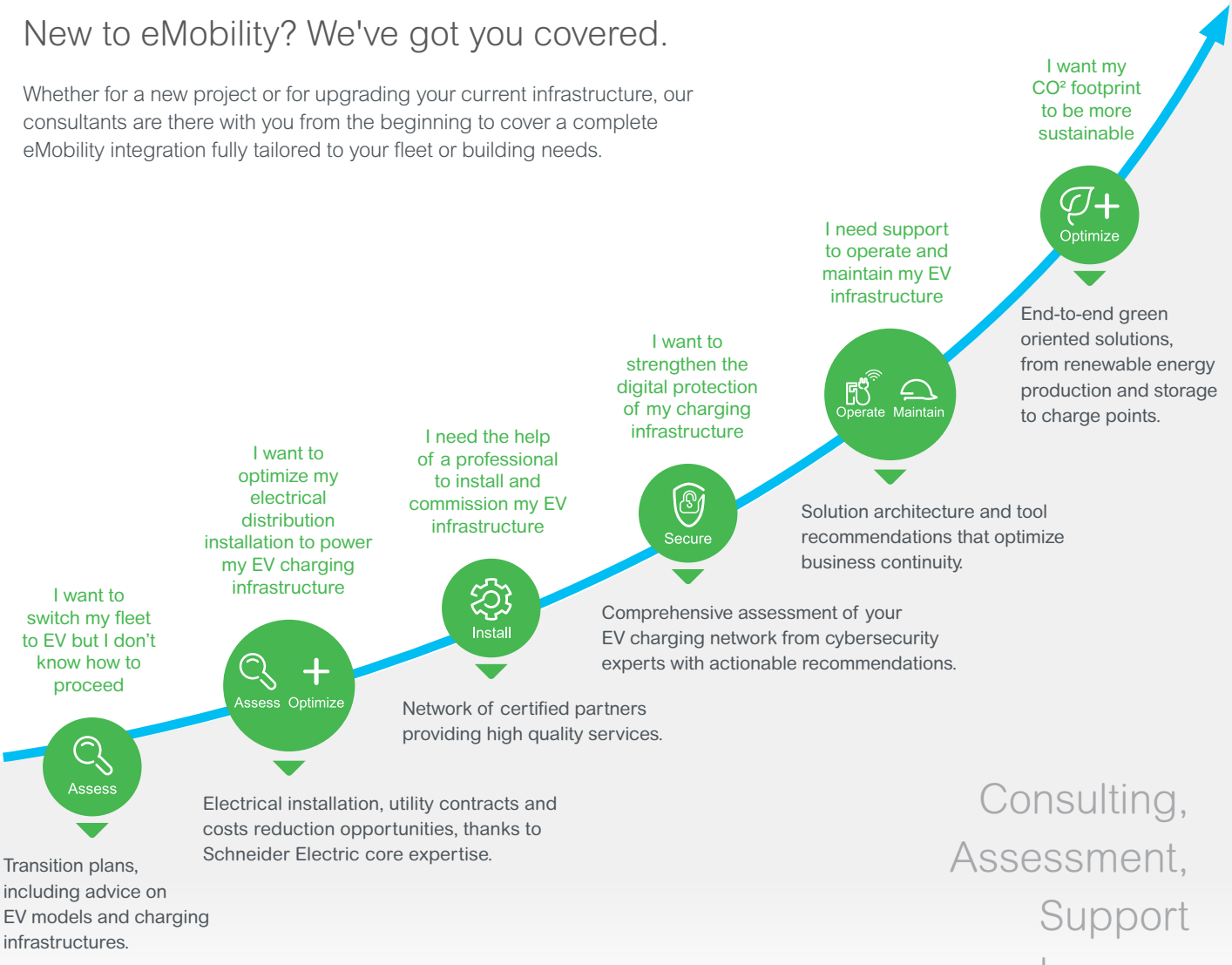


How do I renew and design?

Consulting

New to eMobility? We've got you covered.

Whether for a new project or for upgrading your current infrastructure, our consultants are there with you from the beginning to cover a complete eMobility integration fully tailored to your fleet or building needs.



Consulting,
Assessment,
Support
and more...

Contact your local eMobility sales representative for further information

How do I install and commission?

Commissioning

For complex AC architectures with EcoStruxure EV Charging Expert, EVlink Pro AC or EVlink Pro DC

At Schneider Electric, we take technical support very seriously.

Our technical experts provide on-site and remote assistance in commissioning new charging stations especially when there are building load management and supervision requirements.

Our certified technicians will help the equipment is properly commissioned and programmed. In addition, you will receive a detailed commissioning report, signed off by a Schneider Electric engineer, certifying the equipment is set up correctly and covered by our warranty.

Benefits

- Minimize start-up time and improve end-user satisfaction.
- Take advantage of the expertise of Schneider Electric technicians on the choice of settings to improve system performance.
- Leverage an installation that complies with the Schneider Electric standard of practices and therefore optimizes equipment uptime and costs.

Mobile Apps

Download the MySchneiderApp and Manage your eMobility Asset seamlessly!

Manage the performance of your asset

- Access obsolescence reports and associated service recommendations.
- Access the manufacturer's product documentation linked to your asset and store your own documents.

Anticipate any issues

- Be notified about recommended actions on your installed products: address your concerns about the right products at the right time.

Technical Support

- Our FAQs and contact to the Customer Care Center are available and customized to each of your registered assets.
- One click access to your dedicated technical support team.

Download the Application

REGISTER YOUR ASSET NOW

How do I install and commission?

Warranty Extension

Long-term protection of your asset with warranty extension

Our warranty extension* allows you to expand your factory warranty for an additional one or three years, giving you more flexibility and peace of mind, and improved control of your maintenance budget.

Benefits

- Keep repair costs under control
- Reduce maintenance costs of new products installed
- Tap into coverage flexibility and choose either one or three years

*The warranty extension can only be ordered at the time of purchasing your EVlink charging station.
Check warranty duration with your local sales representative and register the warranty extension by contacting our Customer Care center.

Additional information

Charging station technical document	Language	References		
Brochure	EN	EVlink Warranty Extension: **998-21827492**	EVlink Commissioning Service: **998-21950800_B**	EcoStruxure EV Charging Expert Upgrade and Commissioning package: **998-22046477**
eMobility Services - Statement of work	EN	Warranty Extension: **JYT9348100**	Remote Commissioning: **PKR2869000** Service Plan for DC infrastructure: **DOCA0309**	On-site commissioning for AC infrastructure: **GEX5781900** On-site commissioning for DC infrastructure: **DOCA0308**

Download the above documents on Schneider Electric website.

How do I maintain?

eMobility Service Plan

Extend life and performance of your equipment with our Services Plan

At Schneider Electric, we believe that the time and cost associated with EV charging infrastructure should never be barriers to achieving sustainable goals.

With a fixed yearly plan, you can expect top-of-the-line services from Schneider electric for your eMobility infrastructure, in addition to priority access to on-site and remote support and preferential prices on our spare parts ecosystem.

Benefits

Continuous support

- 8/5 remote technical support with agreed fast response time and on-site support dispatch.

Optimize your investment and increase uptime

- Reduction of downtime thanks to regular preventive maintenance.

Control your budget

- One fixed yearly plan for all your maintenance needs.

Operate in optimum conditions

- High-end services based on the manufacturer's expertise
- With up-to-date features and firmware

Services Plan			
Support to operations	Access to mySchneider portal with chat, visibility of assets and warranty status, visits scheduling and reports		■
	Premium Technical Support	Direct access to experts during business hours with Service Level Agreement on Initial response time	■
		Scheduled Support Session with expert	■
		Remote expertise thanks to remote connectivity	Optional
	On-site intervention	Break-fix on-site intervention	Optional
		Service Level Agreement – subject to local execution capabilities	■
		On-site intervention cost	Preferential tariff
Replacement Parts	Replacement parts	Spare parts cost	Preferential tariff
Maintenance	Preventive Maintenance	Yearly On-Site Preventive Maintenance	■
	Warranty Extension	1 or 3 years warranty extension	Optional

How do I maintain?

eMobility Spare Parts

Maximize reliability and safeguard your maintenance needs with high quality original parts

Schneider Electric provides you with original spare parts as the ideal base for your **preventive maintenance** and – if needed – **repair work.**

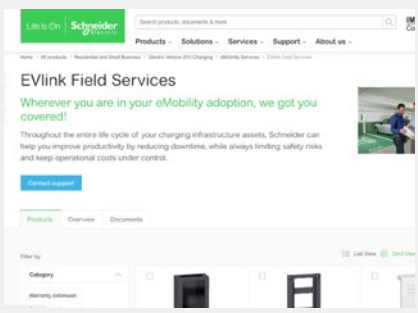
Benefits

Original	• As the manufacturer, Schneider Electric knows everything about the spare parts for its products.
High Quality	• The parts are authentic and the same as used in the actual product. • There is no fear for counterfeit parts when sourcing from the manufacturer.
Available	• Spare parts are available from our local, regional and global stocks. • Fast delivery options can further accelerate the delivery of parts to you.

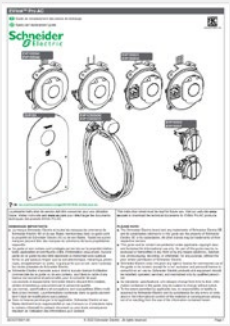
End of life policy

- Schneider Electric provides continuity of service for all withdrawn products.
- Withdrawn spare parts, accessories and charging stations are available for 5 years from the commercialization end date to replace or repair products.

Learn more on Schneider Electric website



Spare part list on the website **EVlink Field services**



Instruction sheet **Spare part replacement guide**

How do I optimize?

EcoStruxure EV Charging Expert Upgrade and commissioning package

Extend the eMobility infrastructure

The EcoStruxure EV Charging Expert upgrade and commissioning package makes your eMobility infrastructure extension project smooth and efficient with newly added features.

Schneider Electric technicians upgrade your EcoStruxure EV Charging Expert license to extend the charging station management capacity and/or to move to dynamic load management.
They also perform on-site commissioning for additional charging stations and update the EcoStruxure EV Charging Expert software settings.

Benefits

- Extend and upgrade your eMobility infrastructure with new functionalities without buying new products
- Minimize upgrade and start-up time thanks to Schneider Electric's fast support
- Benefit from Schneider Electric's expertise to maximize uptime and lifetime of your equipment.

EcoStruxure EV Charging Expert Upgrade and Commissioning Package
998-22046477

EVlink Parking modernization

Extend asset lifetime by replacing the motherboard

Our Electronic Board replacement services help your charging station operate reliably and efficiently. The motherboard can require replacement due to firmware issued or in order to upgrade to OCPP 1.6 on the EVlink Parking 1.

The upgrade of the electronic board for the EVlink Parking Service provides full Electronic Board replacement. Labor and travel are included with this service

Benefits

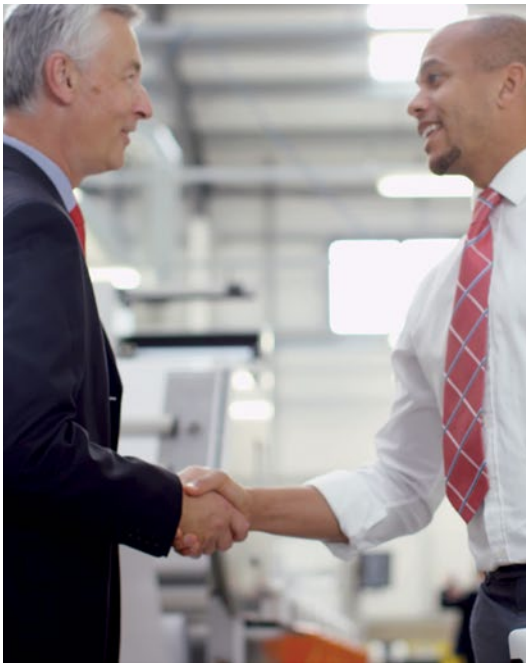
- Extend the lifetime of aging assets
- Modernize your eMobility infrastructure without buying new products
- Postpone full renewal and CapEx investment

Upgrade of the electronic board for EVlink Parking Service
GEX6798200

Get in touch for support

Customer care support

As one of our partners and customers, you have access to our technical support!



We are here for you

Schneider Electric offers bespoke remote support to help you improve your productivity by quickly resolving any technical issues related to your eMobility products, both for the hardware and software.

We speak your language

Your dedicated product specialists are just one phone call away to answer all of your questions and help you with installation, configuration, troubleshooting, and diagnostics of your eMobility products.

Reach out to our Customer Care team in your location

Premium Support

Our Premium Support is a highly responsive service adapted to our most loyal customers.
It allows us to answer their technical questions faster, with a commitment to a timeframe for response, and suitable resources to resolve the issue at hand.

Benefits

Efficiency through expertise	• Direct access to Advanced Support Agents.
Faster reactivity	• Dedicated Service Level Agreement on Initial Respond Time.
Easier to use	• Multi-channel communication (phone, chat and e-mail support) • Schedule a session with experts.
Exclusive, personalized access	• mySchneiderPortal / Exclusive FAQ content

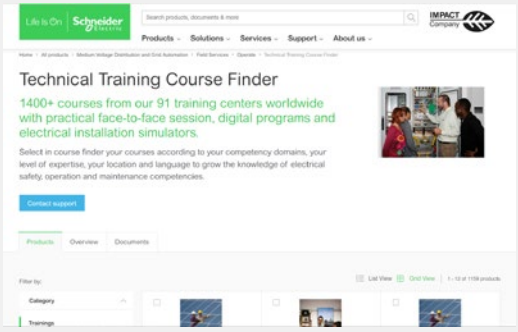
Get in touch for support

eMobility Training

Make the most of your staff's skills, giving them the resources to perform high-end services.

Schneider Electric offers a wide selection of training solutions to enhance your competencies in the right area of expertise.
In addition, you could maximize your workforce's effectiveness through our comprehensive eMobility training and increase the knowledge of features and practices for commissioning, operating and maintaining your EV infrastructure.

Learn more on Schneider Electric website



Select your courses now on the technical training course finder

A professional network

eMobility Partner Program

Approved Installer for EVlink™

Schneider Electric

Schneider eMobility certified experts lead the way towards adopting new technology and processes to deliver high-quality services to our customers.

By becoming part of our partner network, you will be at the forefront of smart charging technology, expand your reach with access to more customers and projects, and benefit from dedicated support to make the difference.

Join our professional network of certified eMobility partners to engage in a continuous specialization path, designed to deliver premium services and differentiate your business.

Benefits

- Gain in-depth knowledge and expertise
- Access to innovative digital tools and technical support
- Co-branding that enables the growth of your business

Mobile Apps for Partners

Easy commissioning with eSetup

eSetup for Electricians is a dedicated app for EVlink Pro AC, Wiser and Facility Expert SB products from Schneider Electric.

- Save time on installation and commissioning since everything can be done within the app.
- Access to the charge details report and maintenance report from the app.

Download the Application

EcoStruxure Facility Expert

A free application to improve your operational efficiency and develop your services business

- Accurate planning of preventive maintenance tasks and interventions which leads to reduced working time
- Greater visibility of your work by easily generated reports that will allow you to create bills faster
- Details of activities undertaken during a given period that will demonstrate the impact of your company's services
- A way to share information securely internally or externally, as your customers will easily have access to the digital copies of your transactions.

Download the Application

Commercial references

Services dedicated to AC infrastructures

Warranty Extension		
Description	Product	Commercial reference
Additional 1-year Warranty Extension	EVlink Pro AC	**EVS2W1B**
Additional 3-year Warranty Extension	EVlink Pro AC	**EVS2W3B**

Training		
Description	Product	Commercial reference
Training AC infrastructure	Training on how to design AC charging Infrastructure	**EVS1TBD**
	Training on how to install & commission AC charging Infrastructure	**EVS1TBIC**
	Training on how to operate & maintain AC charging Infrastructure	**EVS1TBOM**

Commissioning		
Description	Product	Commercial reference
Remote assistance	Max. 5 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CR0L**
	5 to 15 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CRSL**
	Max. 5 EVlink Pro AC charging stations	**EVS1CR0**
	5 to 15 EVlink Pro AC charging stations	**EVS1CRS**
	Option: connection to a supervision solution	**EVS1CRCPO**
On-site	Max. 5 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CF0L**
	5 to 15 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CFSL**
	15 to 50 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CFML**
	50 to 100 EVlink Pro AC charging stations with EcoStruxure EV Charging Expert	**EVS1CFLL**
	Max. 5 EVlink Pro AC charging stations	**EVS1CF0**
	5 to 15 EVlink Pro AC charging stations	**EVS1CFS**
	15 to 50 EVlink Pro AC charging stations	**EVS1CFM**
	Option: connection to a supervision solution	**EVS1CFCPO**

Service Plan		
Description	Product	Commercial reference
Service Plan duration	1 year eMobility Service Plan	**ECOESSEV1Y**
	3 years eMobility Service Plan	**ECOESSEV3Y**
	5 years eMobility Service Plan	**ECOESSEV5Y**
Upgrade Preventive Maintenance	Yearly Preventive Maintenance EVlink Pro AC	**ECOESSPRVPAC**
	Yearly Preventive Maintenance ecoStruxure EV Charging Expert	**ECOESSPRVEVCE**
Upgrade Warranty Extension	1 year Warranty Extension EVlink Pro AC	**ECOESSPACWE**
	1 year Warranty Extension ecoStruxure EV Charging Expert	**ECOESSEVCEWE**
Upgrade FSR on-site dispatch Service Level Agreement (subject to local execution capabilities)	FSR dispatch 8H	**ECOESSEVFSR8H**
	FSR dispatch 12H	**ECOESSEVFSR12H**
	FSR dispatch Next Business Day	**ECOESSEVFSRNBD**
	FSR dispatch 48H	**ECOESSEVFSR48H**

Modernization		
Description	Product	Commercial reference
EVlink Parking modernization	Upgrade of main circuit board, for 1 charge point	**EVS1UFP1B**
	Upgrade of main circuit board, for 2 charge point	**EVS1UFP2B**

Commercial references

Services dedicated to DC infrastructures

Training		
Description	Product	Commercial reference
Training on DC infrastructure	Training on EVlink Pro DC 180 kW – How to Install	**EVS1TID100**

Commissioning		
Description	Product	Commercial reference
Commissioning	On-Site Commissioning for 1 EVlink Pro DC ≥ 120 kW	**EVS1CFD100**

Service Plan		
Description	Product	Commercial reference
Service Plan duration	1 year eMobility Service Plan	**ECOESSEV1Y**
	3 years eMobility Service Plan	**ECOESSEV3Y**
	5 years eMobility Service Plan	**ECOESSEV5Y**
Upgrade Preventive Maintenance	Yearly Preventive Maintenance EVlink Pro AC	**ECOESSPRVPDC100**
Upgrade Warranty Extension	1 year Warranty Extension EVlink Pro AC	**ECOESSPDC100WE**
	1 year Warranty Extension ecoStruxure EV Charging Expert	**ECOESSPDCPMWE**
Upgrade FSR on-site dispatch Service Level Agreement (subject to local execution capabilities)	FSR dispatch 8H	**ECOESSEVFSR8H**
	FSR dispatch 12H	**ECOESSEVFSR12H**
	FSR dispatch Next Business Day	**ECOESSEVFSRNBD**
	FSR dispatch 48H	**ECOESSEVFSR48H**
Upgrade site assessment	1 site assessment EVlink Pro DC 180 kW	**ECOESSEVSAPD100**

On-Demand Service	
On-Demand preventive maintenance visit	**EVS1PMD100**

Electrical Distribution for eMobility

Schneider Electric Power Distribution ..... p. 87

Acti9 Type A-SI or B: Residual Current Devices (RCD) ..... p. 88

ComPact NSX and VigiPacT add-on:
Earth leakage protection..... p. 90

iMNx: undervoltage release tripping unit ..... p. 91

Metering solutions..... p. 92

Decentralized EV distribution: Canalis™ ..... p. 94

MiEV
ELECTRIC VEHICLE

Schneider Electric Power distribution

Increasing use of Electric Vehicle will require an intense growth of charging infrastructure. The vehicle charging needs connection to an electricity supply, the question of electrical distribution is central. The so-called EVSE (electric vehicle supply equipment) are intended to be installed in various environments.

the International Electrotechnical Committee (IEC) defined a set of standards, covering devices for protection (short-circuit, electric shocks, overvoltage) and electrical installation standards.

Please refer to appendix

Overview

Electrical Protections

MCCB

MCB

RCD

iMNx

Energy Efficiency

Metering solutions

EcoStruxure Panel Server

Scalability

Canalis

Kaedra

Pragma

PrismaSeT range

Learn more about Electrical Distribution Solutions

Acti9 Type A-SI or B:
Residual Current Devices (RCD)

Electrical protections for residential or buildings applications

As the EV may rejects DC residual current during charging, the selection of type of RCD shall be considered carefully.

- Type A RCD, complying to IEC 61008 or IEC 61009 series can be used in conjunction with an EVSE equipped with a Residual Direct Current Detecting Device (RDC-DD), complying to IEC 62955, intended to detect 6 mA DC residual current.

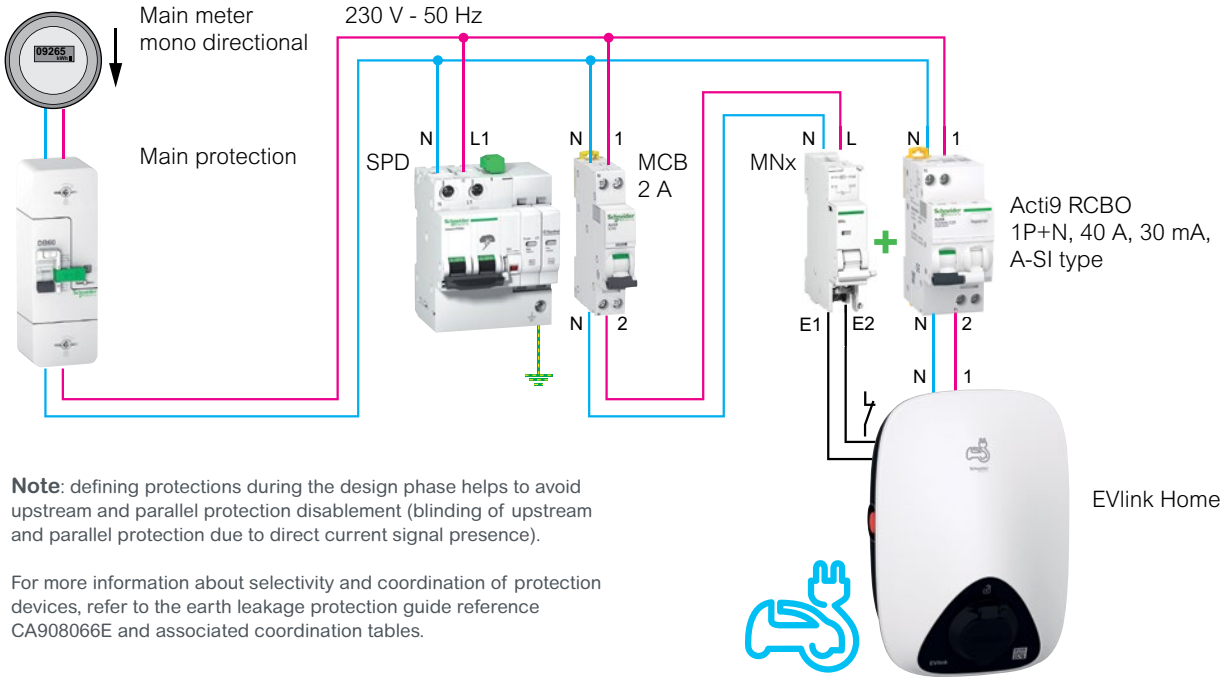
- Type B RCD provides protection against residual AC, pulsating DC and smooth DC residual currents It provides also continuity of service in case of small DC residual currents.

Acti9 iCV40N Type A-SI

- **Helps protect people** against earth leakage currents from multifrequency components, generated by charging station technology that can cause fibrillation and electrocution.
- **Simplify operation** thanks to VisiSafe™ and VisiTrip™.
- **Monitor and control the electrical panel** with PowerTag and Smartlink auxiliaries.

Acti9 iCV40N RCBO Type A-SI is certified (IEC/EN 61008-2-1)

Solution diagram



Note: defining protections during the design phase helps to avoid upstream and parallel protection disablement (blinding of upstream and parallel protection due to direct current signal presence).

For more information about selectivity and coordination of protection devices, refer to the earth leakage protection guide reference CA908066E and associated coordination tables.

Products used

Product	Description	Quantity	Reference
EVlink Home	EV Charging Station	1	Refer to EVlink Home (p. 8)
Acti9 iCV40N 1P+N	Residual current breaker with overcurrent protection Type A-SI	1	Specific to country
Acti9 iMNx	Undervoltage release tripping unit	1	A9A26476

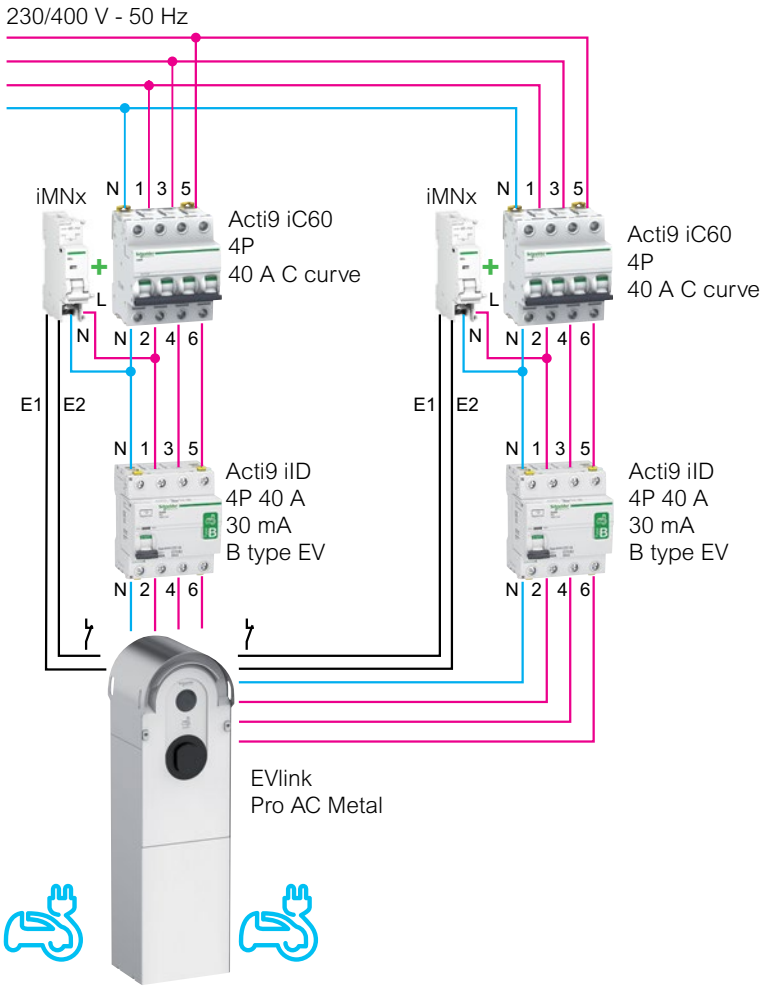
Acti9 Type A-SI or B:
Residual Current Devices (RCD)

Acti9 iID B type for EV

- **Helps protect people** against multifrequency earth leakage currents, generated by charging station technology that can cause fibrillation and electrocution.
- **Be installed** in coordination with other upstream and parallel RCDs (refer to the Schneider Electric Residual Protection Device guide for coordination tables).

IEC 60364-7-722 standard requires a 30mA residual current protection for direct contact.
Acti9 iID B type RCCB for EV is certified (IEC/EN 62423) and is fully compatible with EV charging stations for residential and tertiary applications.

Solution diagram



Products used

Product	Description	Quantity	Reference
EVlink Pro AC	22kw 32A 3PH T2S SOCKET MID embedded - RCD B EV MNX supplied	2	EVB3S22N40MR
EVlink Pro AC Metal kit	EVlink metallic kit for AC floor standing charger 2 charge points	1	EVA1RFKS2
Kaedra enclosure	IP65 1 x 12 modules of 18mm - 267 x 200 x 112 mm	2	Specific to country
Acti9 iMNx	Undervoltage release tripping unit	2 supplied in EVB3S22N40MR	A9A26969
Acti9 iID 2P 40 A 30 mA B type EV	RCCB for EV charging station	2 supplied in EVB3S22N40MR	A9Z51240
MCB 3P+N 40A C curve 6kA/10kA	MCB per charge point	2	Specific to country
MCB 4P 80A C curve 10kA	MCB protection for EVlink Pro AC Metal in the switchboard	1	Specific to country

ComPact NSX and VigiPacT add-on:
Earth leakage protection

ComPact NSX

VigiPact
LV432465

Learn more on
ComPact NSX
& NSXm
Circuit Breakers

ComPact NSX VigiPact add-on

Protection Against Insulation Faults 400/630A, 30mA to 30A, 4 poles.

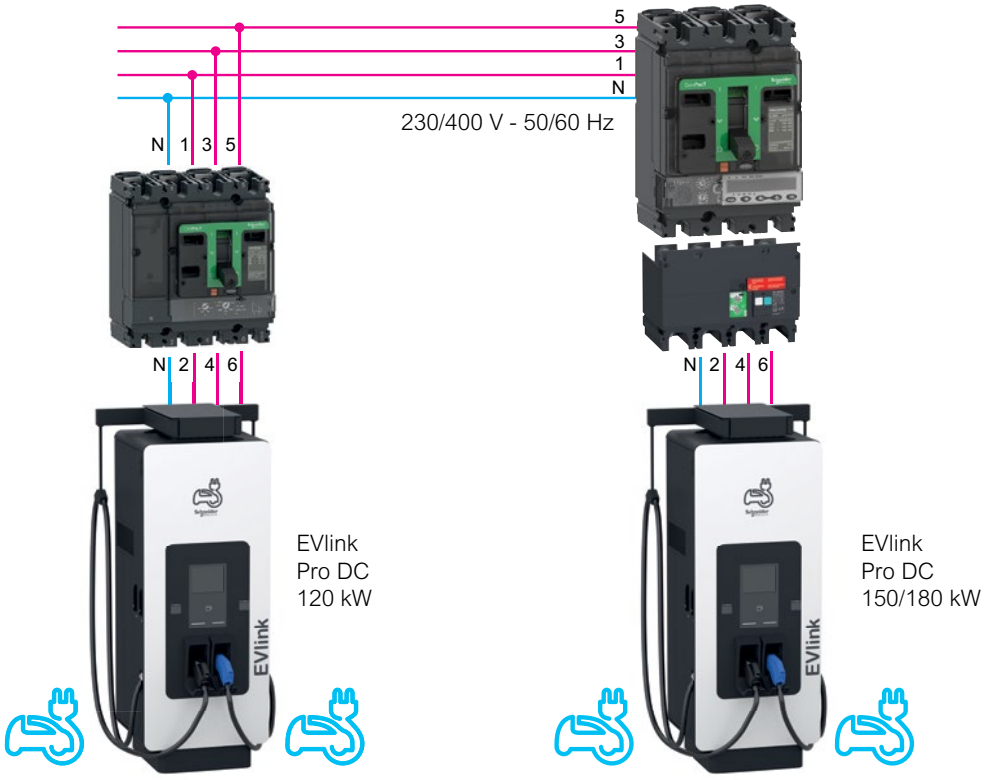
Protections are already integrated in fast charging stations but an additional earth leakage protection may be required to comply with specific local regulations or in case of long wiring.

Depending on the ratings, the additional earth-leakage protection is embedded into the electronic of the trip unit or installed as a ComPacT NSX circuit breaker add-on.

Compliance with standards:

- IEC 60947-2, annex B
- IEC 60755, Type A, immunity to DC components up to 6 mA
- Operation down to -25 °C as per VDE 664

Solution diagram



Current information and protections to use with EVlink Pro DC 120 - 150 - 180 kW				
Current				
Power		**120 kW**	**150 kW**	**180 kW**
	Rated current	**193 A**	**242 A**	**291 A**
	Max. current	**214 A**	**268 A**	**323 A**
Electrical protection				
	Circuit breaker (overcurrent)	**3P+N or 4P**	**3P+N or 4P**	**3P+N or 4P**
	References	**C25F4TM250* or C25F44V2501***	**C40F42D400**	**C40F42D400**
	Optional RCD protection (VigiPact)	-	**LV432465**	**LV432465**

*Optional RCD protection included.
Note: if there is plan to upgrade later (from 120 to 150 kW or 150 to 180kW...) already consider the protection sizings for DC 180kW.

iMNx:
undervoltage release tripping unit

Undervoltage release tripping unit to increase continuity of service and enhance people protection.

iMNx is an undervoltage release, independent from the supply voltage function which adds a second level of electrical protection.

Regardless of the RDC-DD 6 mA and in accordance with IEC60364-5-53 and EV Ready requirements, the MNx helps to protect people during intervention on electrical equipment and to increase continuity of service. IEC61851 ed3.0 §8.1 also recommends a monitoring solution to provide an isolating function.

Most of EVlink Pro AC charging stations have an embedded iMNx release.
If not, iMNx can be supplied with the charging station.

Acti**9** iMNx, undervoltage release

Commercial reference	**A9A26969**
[Uc] control circuit voltage	220...240 V AC 50/60 Hz
Control type	With external feeding
9 mm pitches	2
Width	18 mm

For EVlink Pro AC commercial references with embedded protection

Please refer to page 33

Metering solutions

Metering solutions to display the active energy consumed.

- Maximize charging power in residential and small tertiary applications
- Provide a MID certified meter so that the payment and billing is linked to the amount of energy consumption
- Send active energy consumed information in OCPP to a supervision solution with communicating meters.

Standalone meters with external current transformers

METSEPM5320

PowerLogic Power meter

Commercial reference	METSEPM5320
Communication	1 Ethernet port
Accuracy class	0.5 S
Dimensions	96 x 96 x 72 mm (H x W x D)
Consumption	130 mA / 24 V DC - 65 mA / PoE 48 V DC
To be completed with (not provided) • a closed Current Transformer • a cut-off device • a short-circuiting block	

PowerLogic PM5000 series power meters offer high-end cost management capabilities in a straightforward metering platform.

A9MEM2155

A9MEM3155

iEM Energy meters - MID

Commercial reference	A9MEM2155	A9MEM3155
Communication	Modbus	Modbus
Accuracy class	Class 1 active energy conforming to IEC 62053-21 Class 2 reactive energy conforming to IEC 62053-23 Class B active energy conforming to EN 50470-3	Class 1 active energy conforming to IEC 62053-21 Class 1 active energy conforming to IEC 61557-12 Class B active energy conforming to EN 50470-3
Width	36 mm	90 mm
Poles description	1P+N	3P+N 1P+N 3P

Acti9 iEM3000 series energy meters are cost-attractive, feature-rich energy meters for DIN rails and modular enclosures. More than just kWh meters, the Acti9 iEM3000 series meters provide a full overview of both energy consumption and on-site generation with full four-quadrant measurements of the active and reactive energy delivered and received.

Metering solutions

Circuit breakers with embedded metering

The Enerlin'X communication system provides access to device status, electrical values and control, using Ethernet and Modbus SL communication protocols.

ComPact NSX

Enerlin'X IFE
LV434002

Enerlin'X IFE switchboard server for ComPact NSX circuit breaker

Commercial reference	LV434002
Enerlin'X IFE provides an Ethernet interface to a ComPact NSX circuit breaker when it has an embedded metering module	
Electrical distribution	3-P, 4-P
Communication	Modbus TCP with circuit breaker
Metering	charging station energy consumption

MasterPact MTZ with Micrologic Control unit

Enerlin'X EIFE
LV851001

Enerlin'X EIFE Embedded Ethernet interface for drawout Masterpact MTZ

Commercial reference	LV851001
Enerlin'X EIFE provides an embedded Ethernet interface to a MasterPact circuit breaker with a Micrologic Control unit that can perform the charging stations metering	
Electrical distribution	3-P, 4-P
Communication	Modbus TCP with circuit breaker
Metering	charging station energy consumption

IoT gateway for an intelligent power network

EcoStruxure Panel Server is a modular gateway with enhanced cybersecurity that provides easy and fast connections to multiple concurrent edge control or cloud applications.

EcoStruxure Panel Server
PAS600

EcoStruxure Panel Server

Commercial reference	PAS600 / PAS600L / PAS600T
Ethernet communication	2 Ethernet ports, type 10/100 Base: HTTPS, Modbus TCP/IP, SFTP, SNMP, ARP
Serial communication	1 serial port (RS485, 2 wires) – RS232 not supported
	Modbus serial protocol
Power supply	24 VDC, POE, 100-240 VACDC, 100-277 VACDC (different Panel Server references)
Consumption	3W max for 24 VDC – 5W max for 100-240 VACDC, 100-277 VACDC
Width	72 mm
Operating temperature	-25°C to +70°C

Canalis™ :
Decentralized EV distribution

Canalis busbar trunking system

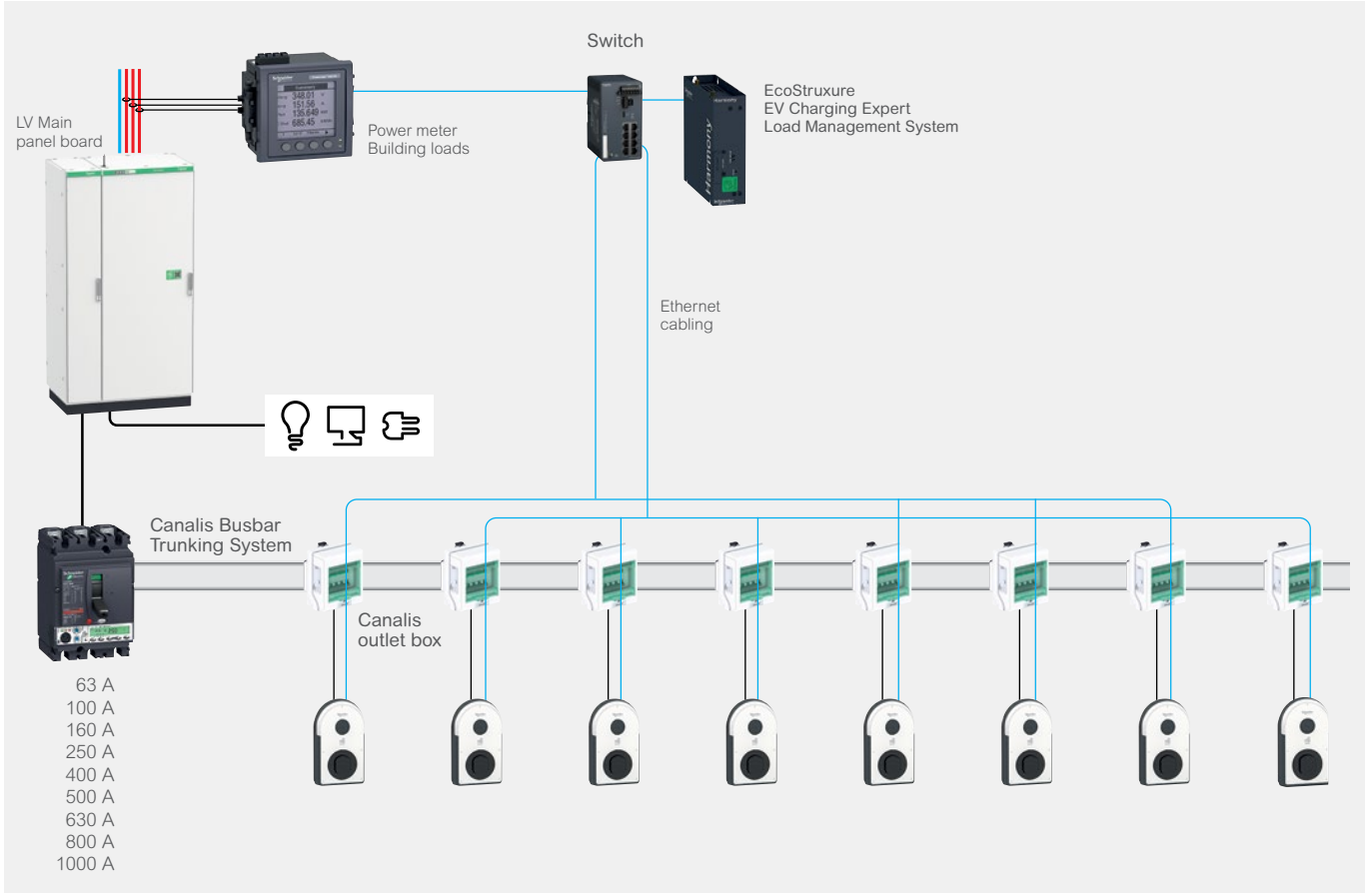
Decentralized EV charger electrical distribution with the Canalis™ busbar trunking system allows you to save time and cost on installation, and to be ready for future extensions.

Save space in your LV Switchboard and cost in the event of a change in the system*:

- Installation in half the time compared with cables
- Future readiness

Decentralized distribution with Canalis is an optimized solution for indoor car parks and garages, bringing easy servicing and scalability. EVlink terminal distribution kits enable direct connection to the busbar.

*Learn more: EV Charging Solutions for Residential and Commercial Buildings eBrochure 998-22207355



Canalis KN, Canalis KS preassembled protection kits for EV chargers*

Technical specification

Canalis KS tap-off unit
KSB63SM48

MCB
A9F07440

RCD
A9Z51440

2-pole and 4-pole pre-assembled and pre-cabled kits for 1 x 8-module tap-off unit

- 1 x circuit breaker
- 1 x RCD B-type for electric vehicle applications

Offer presentation

Canalis KN,
distribution from 40 to 160 A

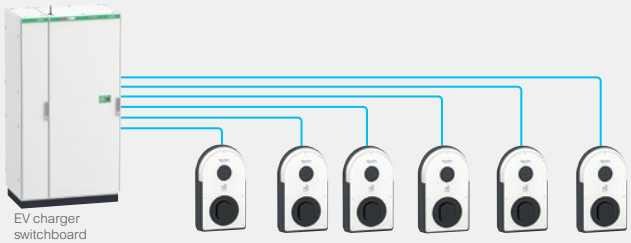
Charging station power	Description of the kit	Included	References		
kW		Tap-off unit	MCB	RCD	Kit
3.7	Protection kit Canalis KN 8 mod. 2P MCB 25 A RCD B EV	KNB63SM48	A9F07220	**A9Z51225**	EVK8KN2PB25
7.4	Protection kit Canalis KN 8 mod. 2P MCB 40 A RCD B EV		A9F07240	**A9Z51240**	EVK8KN2PB40
11	Protection kit Canalis KN 8 mod. 4P MCB 25 A RCD B EV		A9F07420	**A9Z51425**	EVK8KN4PB25
22	Protection kit Canalis KN 8 mod. 4P MCB 40 A RCD B EV		A9F07440	**A9Z51440**	EVK8KN4PB40

Canalis KS,
distribution from 100 to 1000 A

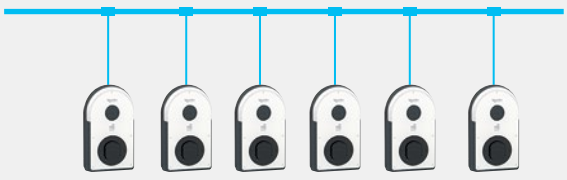
Charging station power	Description of the kit	Included	References		
kW		Tap-off unit	MCB	RCD	Kit
3.7	Protection kit Canalis KS 8 mod. 2P MCB 25 A RCD B EV	KSB63SM48	A9F07220	**A9Z51225**	EVK8KS2PB25
7.4	Protection kit Canalis KS 8 mod. 2P MCB 40 A RCD B EV		A9F07240	**A9Z51240**	EVK8KS2PB40
11	Protection kit Canalis KS 8 mod. 4P MCB 25 A RCD B EV		A9F07420	**A9Z51425**	EVK8KS4PB25
22	Protection kit Canalis KS 8 mod. 4P MCB 40 A RCD B EV		A9F07440	**A9Z51440**	EVK8KS4PB40

Electrical distribution architectures

Centralized distribution



Canalis distribution (decentralized)



* Check availability in your country.

Schneider Electric
Learn more
Mobility

Appendix

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How does it work?.....p. 98
The charging mode determines the protection level.....p. 99
Mode 2, Mode 3 or Mode 4 determines the type of charging connectors ....p. 99
The effective charging capacity is that of the weakest "link".....p. 100
The power of the source determines the charging speed.....p. 100
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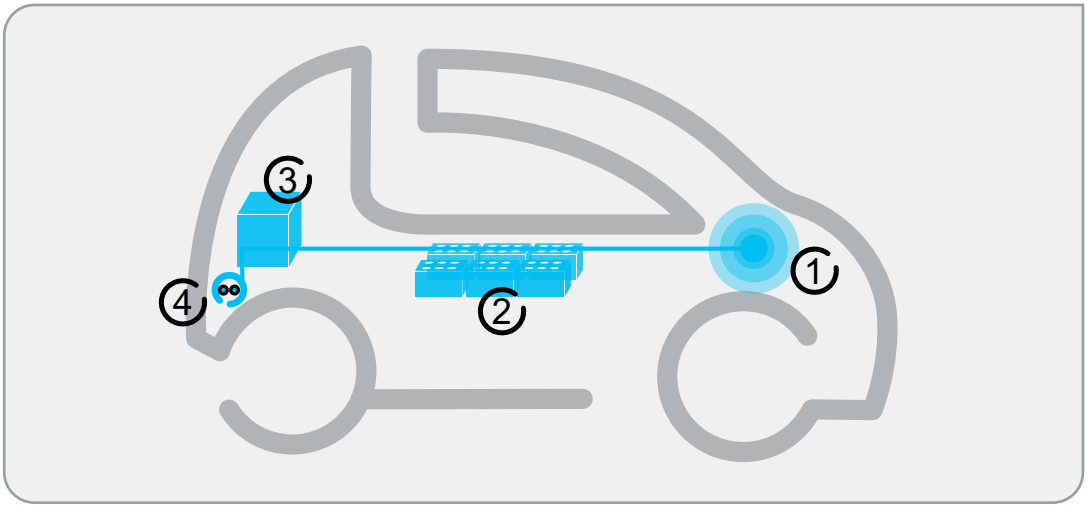
Electric Vehicle additional information

How does it work?



4 major components:

1 Motor

The vehicle has one or more motors. Depending on size and performance, the total power ranges between 15 and 200 kW.

Example: 48 kW (65 hp) for a small 4-seater sedan.

2 Batteries

Huge advances in battery technology have been made in recent years. Lead has gradually been replaced by other, more efficient compounds. Research continues with a view to improving capacity and reducing weight.

The most common technology at present is lithium-ion.

These new batteries have no memory effect and can therefore be charged without having to be completely empty beforehand. They are present in telephones, laptop computers, and some aircraft, as well as in electric vehicles.

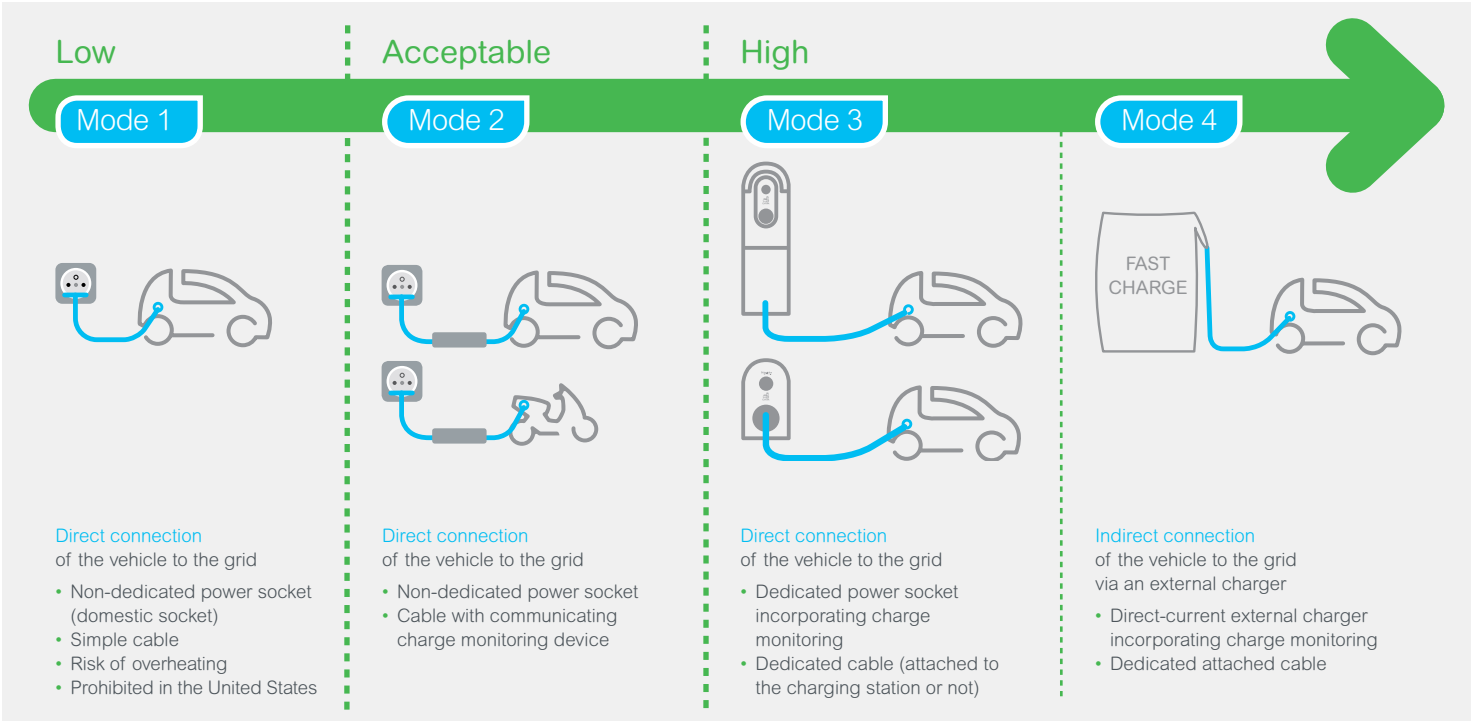
3 On-board charger

The vehicle is fitted with one battery charger supplied in AC by the charging station that defines the maximum charging current available. In some vehicles the battery charger may also be supplied in DC by the charging station.

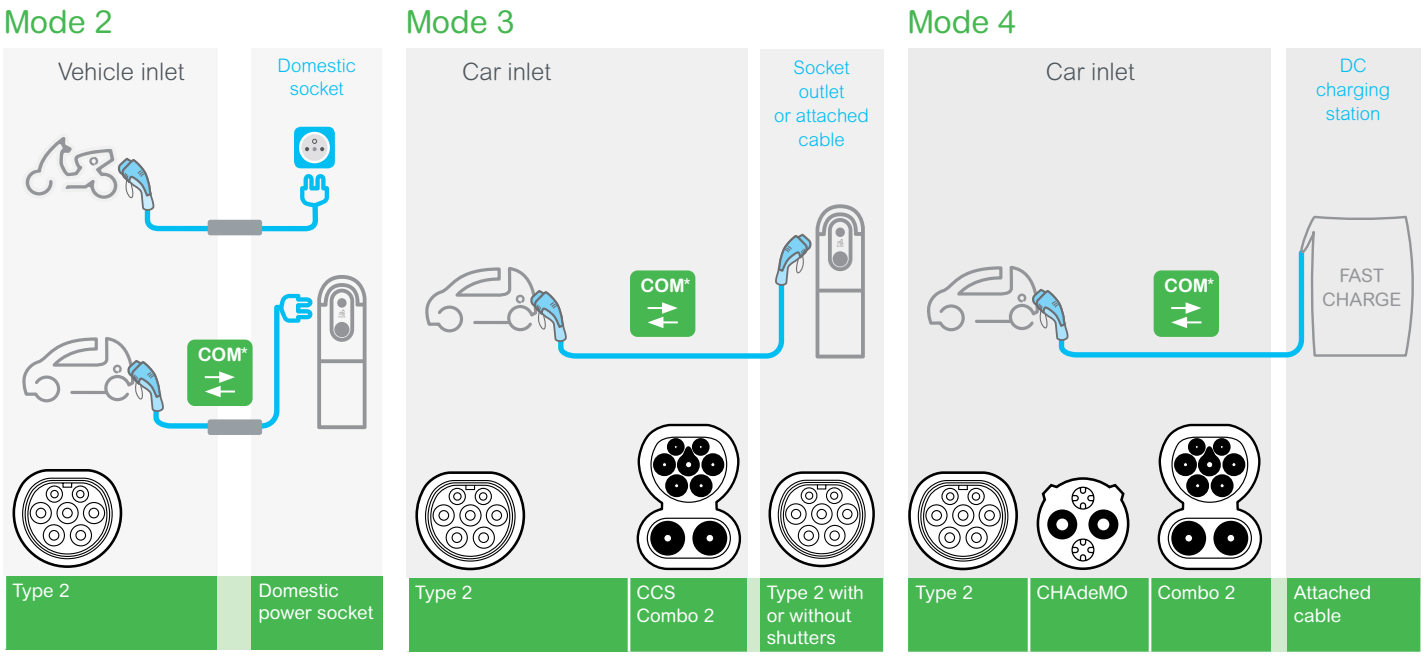
4 Charging inlet

The vehicle is fitted with at least one inlet for AC charging. In some vehicles, the inlet can also be used for DC fast charging or is completed by a second inlet for DC fast charging.

The charging mode determines the protection level



Mode 2, Mode 3 or Mode 4 determines the type of charging connectors



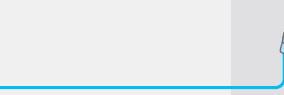
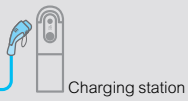
*Focus on technology

Charging cable

A "COM" wire allows data communication between the vehicle and the charging station. The charging process starts only if the following information is OK:
- Vehicle earthing
- Indication of the charging cable rating.

Electric Vehicle additional information

The effective charging capacity is that of the weakest "link", for example:

Vehicle charger	Cable/charging mode	Charging point	Effective charging capacity
7 kW	2.3 kW (Mode 2)	Domestic power socket 2.3 kW (Mode 2)	2.3 kW
7 kW	 7.4 kW (Mode 3)	 Charging station 22 kW	7.4 kW

The power of the source determines the charging speed*

Example: for a vehicle with a 40 kWh battery:

Source used	Domestic power socket	Dedicated AC power socket		Dedicated DC power socket
Power	Single-phase: 2.3 kW	Single-phase: 7.4 kW	Three-phase: 22 kW	Three-phase: 24 kW
Time to a full charge	18 h	7 h	2h30 min	2h
% of charge reached in 30 min	3%	7%	20%	25%

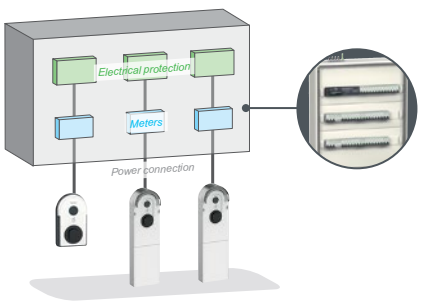
* Subject to the use of a suitable cable.

Focus on technology

Electrical distribution architecture

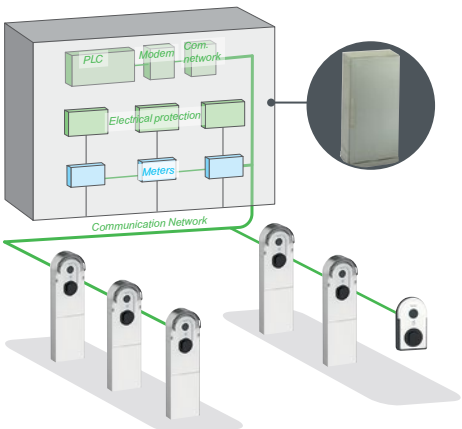
Standalone

One or several charging stations can be connected to the same protection panel.
Each charging station operates independently.
They are protected upstream and their consumption can be measured. The charging stations can be connected to a supervision solution.



Clustered

An alternative way is to manage energy availability: EcoStruxure EV Charging Expert.
This makes it possible to consider various needs related to the use of the vehicles that will be charged. A cluster consists of between 3 and 1000 charging stations, controlled by EcoStruxure EV Charging Expert and a power meter, 3G/4G modem, etc., that can be connected to a supervision solution.



Electric Vehicle standards

Charging an electric vehicle means connection to a powerful electricity supply.
All electrical installations should be properly designed, constructed, and treated according to the IEC standards for EV installations.

The International Electrotechnical Committee (IEC) has defined a set of standards for EV infrastructure, covering devices, protection and electrical installation.

IEC 61851 standard for EV supply equipment

This standard defines the fundamental aspects of EV charging and contains all the requirements covering the EVSE, as equipment. Therefore, the EVSE must comply with the IEC 61851 series and shall be supplied according to IEC 60364-7-722 Requirements.

Electric Vehicle Supply Equipment complying with IEC 61851-1 edition 3

IEC 60364 -part 7-722 for Low Voltage installations

The international series of standards for Low Voltage Electrical Installations (IEC 60364 series) contains a new part dedicated to supplies for electric vehicles.

IEC 60364 part 7-722 requires electrical protective measures:

- **Protection against short-circuits and overloads with circuit breakers**
- **Protection against electric shocks and risks of electrocution with a 30 mA RCD.**
  The RCD shall preferably be of type B, or possibly of type A in case the EVSE contains a 6 mA DC detection
- **Protection against overvoltage with a surge protection device (SPD)**

Acti9 iC60 circuit breaker

Acti9 B type
Earth leakage protection

Acti9 Surge Protection Device

Learn more

Wiki Guide
for electric vehicle charging

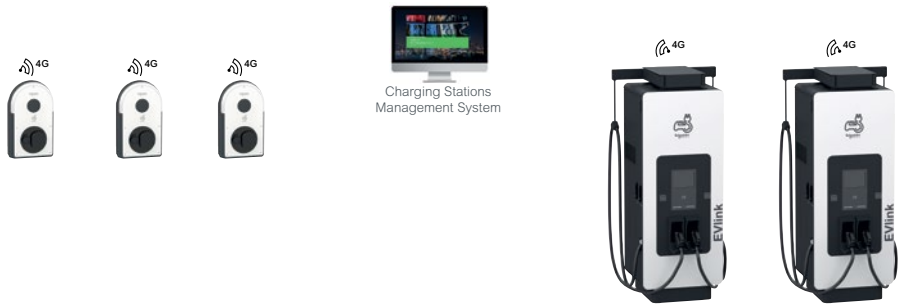
White Paper
Safety measures for electric vehicle charging

Communication network

Possible IT network topologies

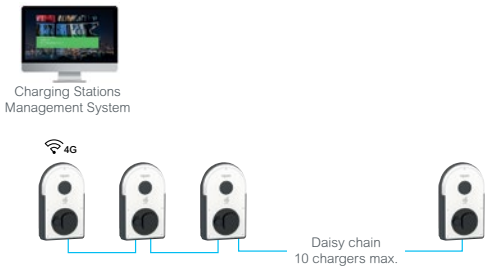
4G embedded modem

Each charging station is individually connected to the Charging Station Management System.



4G embedded modem - EVlink Pro AC Cluster

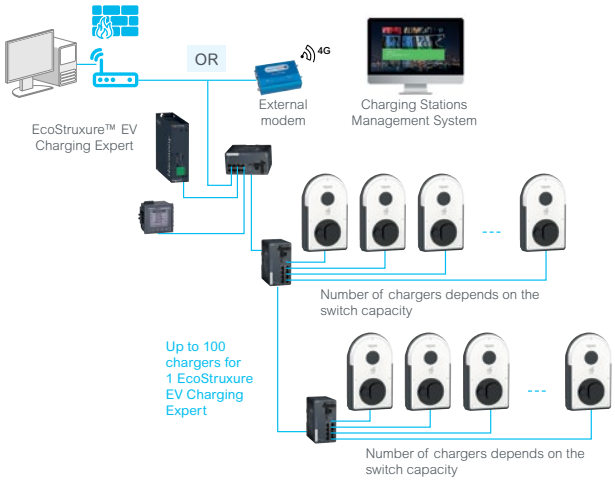
One charging station owns an embedded modem and shares 4G connectivity within a maximum of 9 other charging stations.



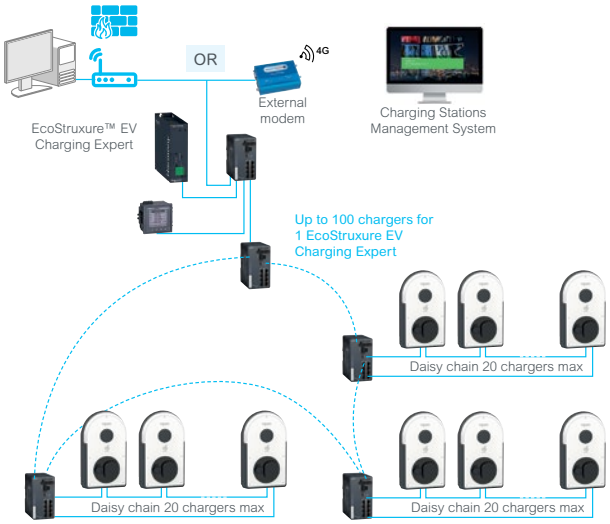
Wi-Fi communication - EVlink Pro DC

This communication set-up requests a local Wi-Fi network.

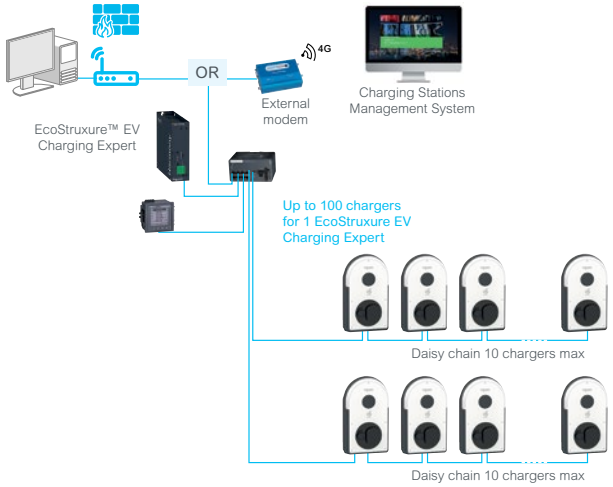
Star topology



Daisy chain loop topology



Daisy chain topology



Modicon Managed and Unmanaged Switches

The Modicon Networking range offers you a smart and flexible way to integrate Ethernet solutions into your operation, from the device level to the control network and to your corporate network.

Unmanaged switch for star topology

4 ports for copper

MCSESU053FN0

8 ports for copper

MCSESU083FN0

Managed switch for ring and daisy chain topologies

4 ports for copper

MCSESM043F23F0

8 ports for copper

MCSESM083F23F0

These managed switches come with the Ethernet TCP/IP protocol.
They come with 4 or 8 copper cable transmission ports.
They provide simple and complex connectivity for multiple Ethernet devices, network management, enhanced cyber security and more advanced switching features.

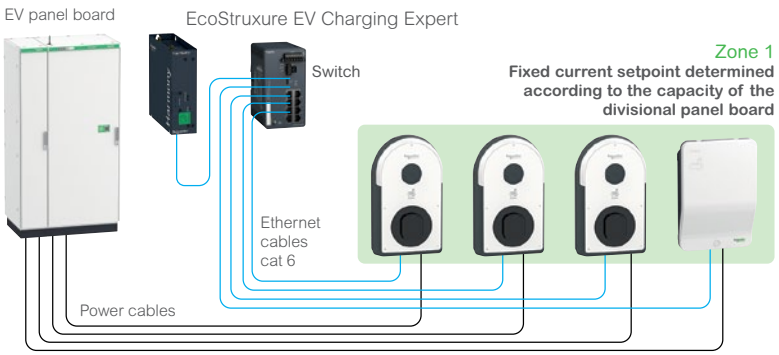
Complete range
of Modicon Switches

EcoStruxure™ EV Charging Expert

Typical load management architectures

Static load management

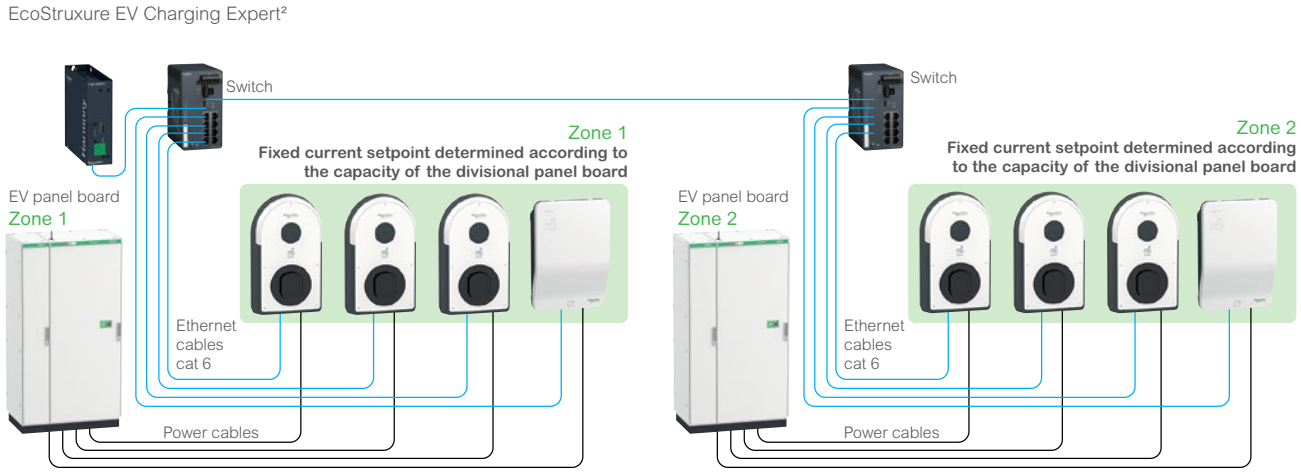
Single-zone



To select the right EcoStruxure EV Charging Expert commercial reference based on all available features, please check the selection table on page 61

EcoStruxure EV Charging Expert
- Up to 5 stations: ref. HMIBSCEA53EDB
- Up to 15 stations: ref. HMIBSCEA53D1ESS
- Up to 50 stations: ref. HMIBSCEA53D1ESM

Multi-zone (multiple switchboards)

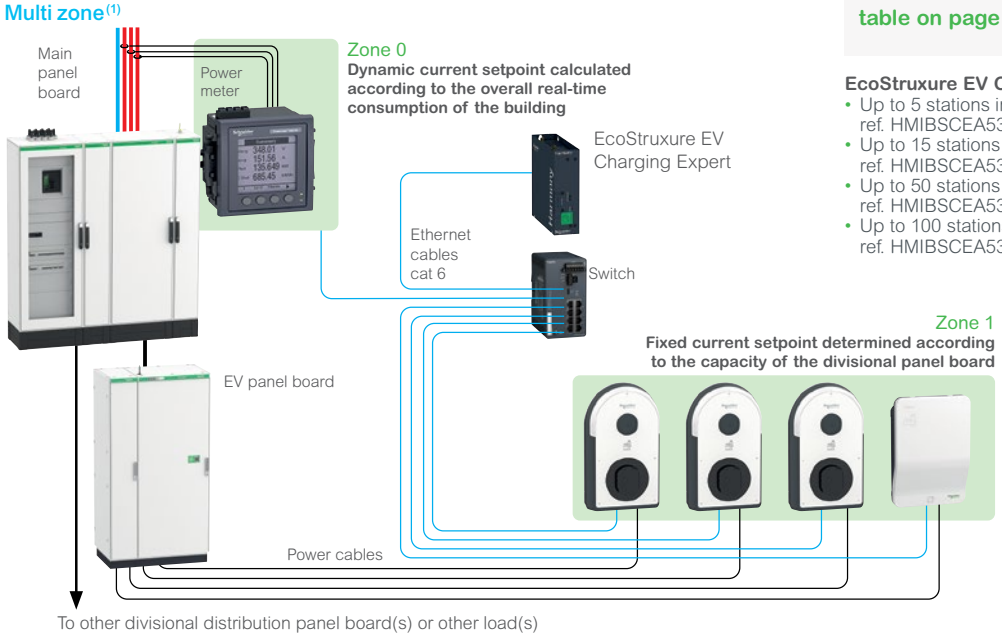


EcoStruxure EV Charging Expert
- From 1 to 5 stations in total, in a maximum of 2 zones: ref. HMIBSCEA53D1EDB
- From 1 to 15 stations in total in 1 single zone: ref. HMIBSCEA53D1ESS
- From 1 to 15 stations in total, in a maximum of 2 zones: ref. HMIBSCEA53D1EDS
- From 1 to 50 stations in total, in a maximum of 10 zones: ref. HMIBSCEA53D1ESM

Dynamic load management

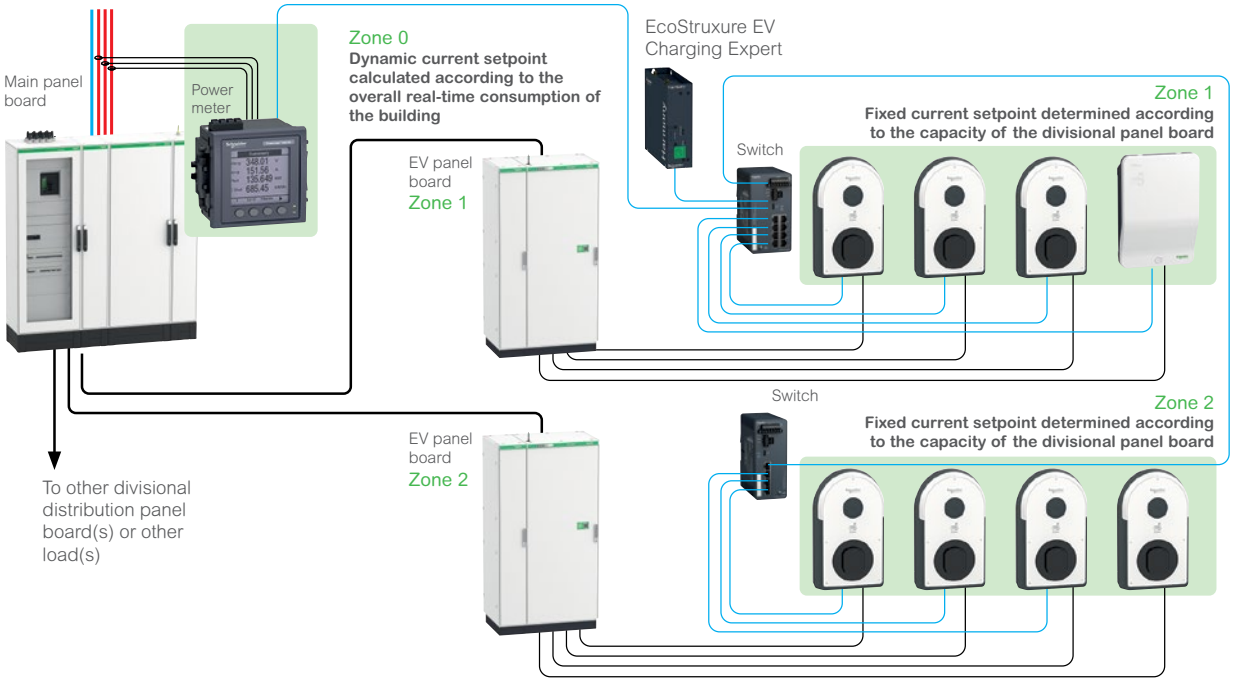
To select the right EcoStruxure EV Charging Expert commercial reference based on all available features, please check the selection table on page 61

Multi zone(1)



EcoStruxure EV Charging Expert
- Up to 5 stations in a maximum of 2 zones: ref. HMIBSCEA53D1EDB
- Up to 15 stations in a maximum of 2 zones: ref. HMIBSCEA53D1EDS
- Up to 50 stations in a maximum of 10 zones: ref. HMIBSCEA53D1EDM
- Up to 100 stations in a maximum of 20 zones: ref. HMIBSCEA53D1EDL

Multi zone(1)

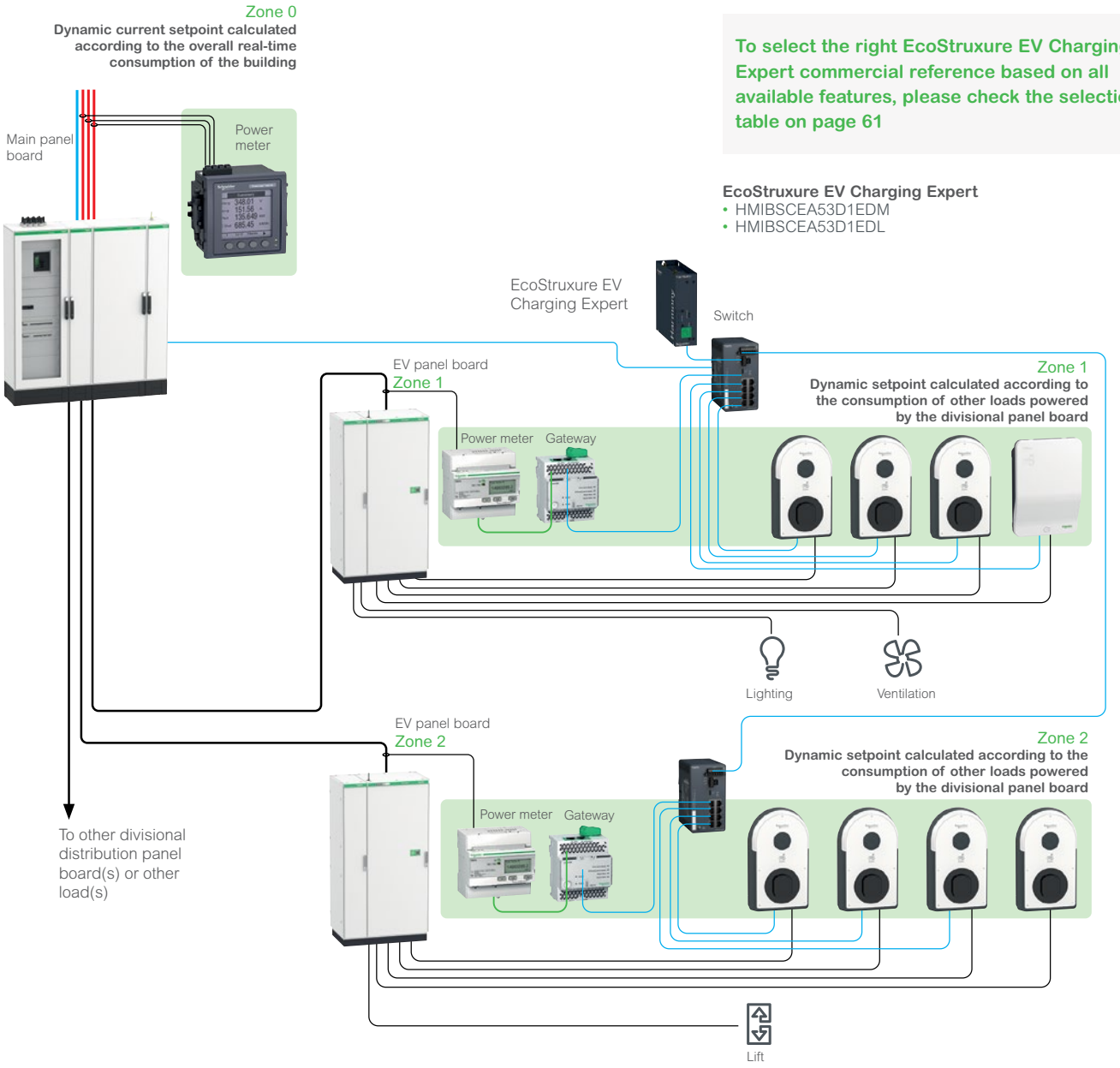


EcoStruxure EV Charging Expert
- HMIBSCEA53D1EDM
- HMIBSCEA53D1EDL

(1) No more than 3 cascaded zones.

EcoStruxure™ EV Charging Expert

Typical load management architectures



To select the right EcoStruxure EV Charging Expert commercial reference based on all available features, please check the selection table on page 61

EcoStruxure EV Charging Expert
- HMIBSCEA53D1EDM
- HMIBSCEA53D1EDL

List of commercial references

EVlink™ Home and Home Smart

Characteristics		References[1]	
		EVlink Home	**EVlink Home Smart**
Charging stations with socket outlet			
T2	3.7 kW (1P - 16 A)	**EVH4S03N2**	**EVH4A03N2**
	7.4 kW (1P - 32 A)	**EVH4S07N2**	**EVH4A07N2**
	11 kW (3P - 16 A)	**EVH4S11N2**	**EVH4A11N2**
T2 with shutter	3.7 kW (1P - 16 A)	**EVH4S03N4**	**EVH4A03N4**
	7.4 kW (1P - 32 A)	**EVH4S07N4**	**EVH4A07N4**
	11 kW (3P - 16 A)	**EVH4S11N4**	**EVH4A11N4**
Charging stations with attached cable (5 m)			
	3.7 kW (1P - 16 A)	**EVH4S03NC**	**EVH4A03NC**
	7.4 kW (1P - 32 A)	**EVH4S07NC**	**EVH4A07NC**
	11 kW (3P - 16 A)	**EVH4S11NC**	**EVH4A11NC**

Characteristics	References	
	EVlink Home	**EVlink Home Smart**
Charging stations with TIC*		
Evlink Home 1P T2S 3.7 kW 16 A - with RDC-DD - TIC	**EVH4S03N400F**	-
EVlink Home 1P T2S 7.4 kW 32 A - with RDC-DD - TIC	**EVH4S07N400F**	-
EVlink Home 3P T2S 11 kW 16 A - with RDC-DD - TIC	**EVH4S11N400F**	-
EVlink Home Smart 1P T2S 3.7 kW 16 A - with RDC-DD - TIC	-	**EVH4A03N400F**
EVlink Home Smart 1P T2S 7.4 kW 32 A - with RDC-DD - TIC	-	**EVH4A07N400F**
EVlink Home Smart 3P T2S 11 kW 16 A - with RDC-DD - TIC	-	**EVH4A11N400F**

*Only for France

Accessories	References[1]
Peak controller	
1 Phase Universal Peak Controller	**EVA1HPC1**
3 Phase Universal Peak Controller	**EVA1HPC3**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

List of commercial references

EVlink™ Pro AC and Pro AC Metal

Characteristics	References
Charging stations with socket outlet	
EVlink Pro AC 7.4 kW 32 A 1PH T2S SOCKET 6 mA RCD Type Asi MNX	**EVB3S07N4A**
EVlink Pro AC 7.4 kW 32 A 1PH T2S SOCKET 6 mA RCD Type Asi MNX MID	**EVB3S07N4AM**
EVlink Pro AC 7.4 kW 32 A 1PH T2S TE SOCKET 6 mA RCD Type Asi MNX MID	**EVB3S07N4EAM**
EVlink Pro AC 7.4 kW 32 A 1PH T2S TE SOCKET 6 mA RCD Type Asi MNX	**EVB3S07N4EA**
EVlink Pro AC 7.4 kW 32 A 1PH T2S SOCKET 6 mA MNX MID	**EVB3S07N40M**
EVlink Pro AC 7.4 kW 32 A 1PH T2S TE SOCKET 6 mA MNX MID	**EVB3S07N40EM**
EVlink Pro AC 11 kW 16 A 3PH T2S SOCKET 6 mA RCD Type Asi MNX	**EVB3S11N4A**
EVlink Pro AC 11 kW 16 A 3PH T2S TF SOCKET RCD Type B EV MNX	**EVB3S11N4FB**
EVlink Pro AC 22 kW 32 A 3PH T2S SOCKET RCD Type B EV MNX	**EVB3S22N4B**
EVlink Pro AC 22 kW 32 A 3PH T2S SOCKET 6 mA RCD Type Asi MNX	**EVB3S22N4A**
EVlink Pro AC 22 kW 32 A 3PH T2S TE SOCKET 6 mA RCD Type Asi 30 mA MNX	**EVB3S22N4EA**
EVlink Pro AC 22 kW 32 A 3PH T2S TE SOCKET RCD Type B EV MNX	**EVB3S22N4EB**
EVlink Pro AC 22 kW 32 A 3PH T2S TF SOCKET RCD Type B EV MNX	**EVB3S22N4FB**
EVlink Pro AC 22 kW 32 A 3PH T2S SOCKET MID 6 mA and MNX supplied	**EVB3S22N40M**
EVlink Pro AC 22 kW 32 A 3PH T2S TE SOCKET MID 6 mA and MNX supplied	**EVB3S22N40EM**
EVlink Pro AC 22 kW 32 A 3PH T2S TF SOCKET MID 6 mA and MNX supplied	**EVB3S22N40FM**
EVlink Pro AC 22 kW 32 A 3PH T2S SOCKET 6 mA MNX	**EVB3S22N4**
EVlink Pro AC 22 kW 32 A 3PH T2S TE SOCKET 6 mA MNX	**EVB3S22N4E**
EVlink Pro AC Metal 22 kW 32 A 3PH T2S SOCKET MID and RCD B EV MNX supplied	**EVB3S22N40MR**
EVlink Pro AC 7.4 kW 32 A 1PH T2S SOCKET 6 mA	**EVB3S07N41**
EVlink Pro AC 7.4 kW 32 A 1PH T2S TE SOCKET 6 mA	**EVB3S07N4E1**
EVlink Pro AC 22 kW 32 A 3PH T2S SOCKET 6 mA	**EVB3S22N41**
EVlink Pro AC 22 kW 32 A 3PH T2S TE SOCKET 6 mA	**EVB3S22N4E1**
Charging stations with attached cable	
EVlink Pro AC 7.4 kW 32 A 1PH Attached Cable 6 mA RCD Type Asi MNX	**EVB3S07NCA**
EVlink Pro AC 7.4 kW 32 A 1PH Attached Cable 6 mA RCD Type Asi MNX MID	**EVB3S07NCAM**
EVlink Pro AC 7.4 kW 32 A 1PH Attached Cable 6 mA RCD-DD and MNX supplied	**EVB3S07NC0**
EVlink Pro AC 22 kW 32 A 3PH Attached Cable 6 mA RCD-DD and MNX supplied	**EVB3S22NC0**
EVlink Pro AC 11 kW 16 A 3PH Attached Cable 6 mA RCD Type Asi MNX	**EVB3S11NCA**
EVlink Pro AC 22 kW 32 A 3PH Attached Cable 6 mA RCD Type Asi MNX	**EVB3S22NCA**
EVlink Pro AC 22 kW 32 A 3PH Attached Cable RCD Type B EV MNX	**EVB3S22NCB**
EVlink Pro AC 22 kW 32 A 3PH Attached Cable MID 6 mA and MNX supplied	**EVB3S22NC0M**

Accessories	References(1)
Pack of 10 RFID Badges	**EVP1BNS**
Cable holder for EVlink Pro AC Metal charger	**EVA1FWHS12**
Permanent T2S socket cable holder EVlink Pro AC	**EVA1PLS1**
Pedestal	
Pedestal for 1 EVlink Pro AC Charger	**EVA1PBS1**
Pedestal for 2 EVlink Pro AC Chargers	**EVA1PBS2**
Plate to convert Pedestal for 1 charger to Pedestal for 2 EVlink Pro AC	**EVA1PCS2**
Metallic kits	
EVlink Pro AC Metal wall mount 1 charge point kit	**EVA1RWKS1**
EVlink Pro AC Metal floor standing 1 charge point kit	**EVA1RFKS1**
EVlink Pro AC Metal floor standing 2 charge points kit	**EVA1RFKS2**
Enclosures	
Thalassa PLS box kit IP66 power cable 25 35²	**EVA1RFKES**
Communication interface	
4G kit - embedded modem with 2 internal antennas for EVlink Pro AC	**EVA1MS**
4G kit - embedded 4G modem with an external antenna for EVlink Pro AC Metal	**EVA1MM**
Smart meter connection Historical Standard TIC tele information client card EVlink Pro AC	**EVA1MTH**

Charging cables	References
EVlink charging cables	
T2-T2 plug connector 32 A 1 Phase 5 m length	**EVP1CNS32122**
T2-T2 plug connector 32 A 1 Phase 7 m length	**EVP1CNL32122**
T2-T2 plug connector 32 A 1 Phase 10 m length	**EVP1CNX32122**
T2-T2 plug connector 32 A 3 Phase 5 m length	**EVP1CNS32322**
T2-T2 plug connector 32 A 3 Phase 7 m length	**EVP1CNL32322**
T2-T2 plug connector 32 A 3 Phase 10 m length	**EVP1CNX32322**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

List of commercial references

Spare parts	References
Front panel	
SE white front plate EVlink Pro AC	**EVP1SS**
Socket outlet	
1PH socket outlet T2S EVlink Pro AC	**EVP1SSS41**
3PH socket outlet T2S EVlink Pro AC	**EVP1SSS43**
1PH socket outlet T2S and domestic Tx (not supplied) EVlink Pro AC	**EVP1SSS51**
3PH socket outlet T2S and domestic Tx (not supplied) EVlink Pro AC	**EVP1SSS53**
TE domestic socket EVlink Pro AC	**EVP1SSSE**
TF domestic socket EVlink Pro AC	**EVP1SSSF**
Attached cable	
T2 attached cable 3PH 32 A 5 meter length EVlink Pro AC	**EVP1CSS323C**
T2 attached cable 1PH 32 A 5 meter length EVlink Pro AC	**EVP1CSS321C**
T2 attached cable 3PH 32 A 7 meter length EVlink Pro AC	**EVP1CSL323C**
T2 attached cable 1PH 32 A 7 meter length EVlink Pro AC	**EVP1CSL321C**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

List of commercial references

EVlink™ Pro AC and Pro AC Metal

Services	References[1]
EVlink Pro AC - Warranty extension	
Additional 1-year Warranty Extension for EVlink Pro AC	**EVS2W1B**
Additional 3-year Warranty Extension for EVlink Pro AC	**EVS2W3B**
Training	
Training on how to design AC charging Infrastructure	**EVS1TBD**
Training on how to install & commission AC charging Infrastructure	**EVS1TBIC**
Training on how to operate & maintain AC charging Infrastructure	**EVS1TBOM**

Comissioning	References[1]
Remote assistance	
Max. 5 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CR0L**
5 to 15 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CRSL**
Max. 5 EVlink Pro AC charging stations	**EVS1CR0**
5 to 15 EVlink Pro AC charging stations	**EVS1CRS**
Option: connection to a supervision solution	**EVS1CRCPO**
On-site	
Max. 5 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CF0L**
5 to 15 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CFSL**
15 to 50 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CFML**
50 to 100 EVlink Pro AC charging stations with EcoStruxture EV Charging Expert	**EVS1CFLL**
Max. 5 EVlink Pro AC charging stations	**EVS1CF0**
5 to 15 EVlink Pro AC charging stations	**EVS1CFS**
15 to 50 EVlink Pro AC charging stations	**EVS1CFM**
Option: connection to a supervision solution	**EVS1CFCPO**

Service Plan	References[1]
Service Plan duration	
1 year eMobility Service Plan	**ECOESSEV1Y**
3 years eMobility Service Plan	**ECOESSEV3Y**
5 years eMobility Service Plan	**ECOESSEV5Y**
Upgrade Preventive Maintenance	
Yearly Preventive Maintenance EVlink Pro AC	**ECOESSPRVPAC**
Yearly Preventive Maintenance ecoStruxure EV Charging Expert	**ECOESSPRVEVCE**
Upgrade Warranty Extension	
1 year Warranty Extension EVlink Pro AC	**ECOESSPACWE**
1 year Warranty Extension ecoStruxure EV Charging Expert	**ECOESSEVCEWE**
Upgrade FSR on-site dispatch Service Level Agreement (subject to local execution capabilities)	
FSR dispatch 8H	**ECOESSEVFSR8H**
FSR dispatch 12H	**ECOESSEVFSR12H**
FSR dispatch Next Business Day	**ECOESSEVFSRNBD**
FSR dispatch 48H	**ECOESSEVFSR48H**

Modernization	References[1]
EVlink Parking modernization	
Upgrade of main circuit board, for 1 charge point	**EVS1UFP1B**
Upgrade of main circuit board, for 2 charge point	**EVS1UFP2B**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

List of commercial references

EVlink™ DC Fast Chargers

Characteristics	References
Charging Stations	
EVlink DC 24 kW CHAdeMO	**EVD1S24T0H**
EVlink DC 24 kW CCS2	**EVD1S24T0B**
EVlink DC 24 kW CCS2 + CHAdeMO	**EVD1S24THB**
EVlink DC 24 kW CCS2 + CHAdeMO + AC Type 2S	**EVD1S24THB2**
Accessories	
Pedestals for EVD1S24T0H, EVD1S24T0B	**EVP1DB1LG**
Pedestals for EVD1S24THB, EVD1S24THB2	**EVP1DB2LG**

EVlink™ Pro DC 120-150-180 kW

Characteristics	References
Charging Stations	
EVLINK Pro DC 120 kW DC CCS Combo 2 + CCS Combo 2	**EVD1S120TBB**
EVLINK Pro DC 120 kW DC CHAdeMO + CCS Combo 2	**EVD1S120THB**
EVLINK Pro DC 150 kW DC CCS Combo 2 + CCS Combo 2	**EVD1S150TBB**
EVLINK Pro DC 150 kW DC CHAdeMO + CCS Combo 2	**EVD1S150THB**
EVLINK Pro DC 180 kW DC CCS Combo 2 + CCS Combo 2	**EVD1S180TBB**
EVLINK Pro DC 180 kW DC CHAdeMO + CCS Combo 2	**EVD1S180THB**
Accessories	
Pack of 10 RFID Badges	**EVP1BNS**

EVlink™ Pro DC 120-150-180 kW Services

Training	References
Training on DC infrastructure	
Training on EVlink Pro DC 180 kW – How to Install	**EVS1TID100**

Commissioning	References
On site	
For 1 EVlink Pro DC ≥ 120 kW	**EVS1CFD100**

Service Plan	References(1)
Service Plan duration	
1 year eMobility Service Plan	**ECOESSEV1Y**
3 years eMobility Service Plan	**ECOESSEV3Y**
5 years eMobility Service Plan	**ECOESSEV5Y**
Upgrade Preventive Maintenance	
Yearly Preventive Maintenance Pro DC 180 kW (must be sold with any of the Service plan reference)	**ECOESSPRVPDC100**
Upgrade Warranty Extension	
1 year Warranty Extension Pro DC 180 kW	**ECOESSPDC100WE**
1 year Warranty Extension for Power Module	**ECOESSPDCPMWE**
Upgrade FSR on-site dispatch Service Level Agreement (subject to local execution capabilities)	
FSR dispatch 8H	**ECOESSEVFSR8H**
FSR dispatch 12H	**ECOESSEVFSR12H**
FSR dispatch Next Business Day	**ECOESSEVFSRNBD**
FSR dispatch 48H	**ECOESSEVFSR48H**
Upgrade site assessment	
1 site assessment EVlink Pro DC 180 kW	**EVS1PMD100**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

List of commercial references

EcoStruxure™ EV Charging Expert

Characteristics	References(1)
Core	
EV Charging Expert Core 5 CS dynamic	**HMIBSCEA53D1EDB**
EV Charging Expert Core 15 CS dynamic	**HMIBSCEA53D1EDS**
EV Charging Expert Core 50 CS dynamic	**HMIBSCEA53D1EDM**
EV Charging Expert Core 15 CS static	**HMIBSCEA53D1ESS**
EV Charging Expert Core 50 CS static	**HMIBSCEA53D1ESM**
EV Charging Expert Core 100 CS dynamic	**HMIBSCEA53D1EDL**
Upgrade	
EV Charging Expert Upgrade dynamic 5 CS to 15 CS	**EVLMSEDB2EDS**
EV Charging Expert Upgrade dynamic 5 CS to 50 CS	**EVLMSEDB2EDM**
EV Charging Expert Upgrade dynamic 5 CS to 100 CS	**EVLMSEDB2EDL**
EV Charging Expert Upgrade 15 CS from static to dynamic	**EVLMSESS2EDS**
EV Charging Expert Upgrade static from 15 CS to 50 CS	**EVLMSESS2ESM**
EV Charging Expert Upgrade from 15 CS static to 50 CS dynamic	**EVLMSESS2EDM**
EV Charging Expert Upgrade dynamic from 15 CS to 50 CS	**EVLMSEDS2EDM**
EV Charging Expert Upgrade from 15 CS static to 100 CS dynamic	**EVLMSESS2EDL**
EV Charging Expert Upgrade dynamic from 15 CS to 100 CS	**EVLMSEDS2EDL**
EV Charging Expert Upgrade from 50 CS static to 50 CS dynamic	**EVLMSESM2EDM**
EV Charging Expert Upgrade static 50 CS to dynamic 100 CS	**EVLMSESM2EDL**
EV Charging Expert Upgrade dynamic from 50 CS to 100 CS	**EVLMSEDM2EDL**

(1) References to be defined and local availability to be checked by Schneider Electric front offices.

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Notes

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