#### **CUSTOMER STORY**

### Enerhub



# How Enerhub ensures secure and reliable smart EV charging with EMnify

As an Italian Charge Point Operator (CPO) and e-Mobility Service Provider (EMSP), Enerhub's goal is to simplify the provision of EV charging service for businesses while offering EV drivers the widest possible network of charging infrastructures.

For Enerhub to deliver a continuous charging service with maximum operational time, secure and reliable communications between the charging stations and its service management portal are a prerequisite.

Equally important is the ability to commission, manage, and maintain charge points efficiently and conveniently from the central office via a remote access tunnel. The Bologna-based e-mobility company found all it was looking for in EMnify.



#### **About**

- Headquarter: Bologna, Italy
- Industry: EV Charging



#### Goals

As a CPO, ensuring uninterrupted charge point operations, and as an EMSP, making it easy for EV drivers to recharge vehicles anytime and anywhere



#### Solution:

End-to-end service for EV charging infrastructure and an EV driver app / web interface



#### EMnify's products in use:

#### Connect:

 Multi-network IoT SIM: Connecting to the best network and simplifying deployments in indoor and underground parking places

#### Operate:

- <u>EMnify Portal</u>: Complete SIM and connectivity control and visibility.
- OpenVPN: Remote configuration and maintenance of charge points

#### Secure:

 <u>Cloud Connect (IPsec/VPN):</u> Secure charge point communications with reduced costs and complexity



"EMnify's Cloud Connect helps us guarantee charging security at all times and removes the need for an in-house IT security infrastructure. This saves us significant operational costs."



**FEDERICO RIVELLI**Project Manager, Enerhub





## Enhanced security for customers using cellular IoT

Enerhub offers a full service of supplying, installing and operating charging stations on private business premises and semi-private parking areas like shopping centers and places of interest.

"We chose cellular connectivity because we want to create a standalone EV charging network separated from our customers' private networks, eliminating external security risks for them," explained Federico Rivelli, Project Manager at Enerhub.

Each charging station can comprise multiple charge points for simultaneous charging and is equipped with an EMnify SIM card to communicate with the Enerhub's backend for charge point management.

"We have a strong focus on security, and EMnify stood out to us in this aspect," said Giuseppe Danza, Technical Support Specialist at Enerhub. Using EMnify Cloud Connect, Enerhub can establish an IPsec/VPN tunnel between the EMnify platform and its management backend to encrypt and protect all charge point communication. The best part? All can be done in a self-service fashion within minutes.

## Seamless charging experience for EV drivers powered by multinetwork IoT SIMs

On the end-user front, Enerhub provides both web and native apps that allow EV drivers to locate available chargers in the vicinity. Likewise, users can start and stop charging sessions at the push of a button and have a complete view of the charging process.





"Maximum signal reception is vital for our charge points to receive session commands from the user app in a timely manner. With many parking areas located underground, EMnify's multi-network SIM cards give us the assurance that our charge points have the most reliable connection."

Federico Rivelli
Project Manager, Enerhub





## Streamlined charge point commissioning and maintenance processes

The communication between Enerhub's charge points and management backend is defined by the industry-standard Open Charge Point Protocol (OCPP).

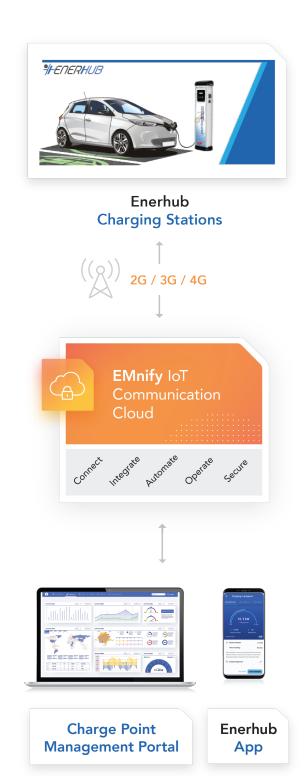
Upon the first installation and activation of charge points, multiple OCPP parameters including timestamps and power management need to be set up for the connection to happen.



"During the hardware installation, it is easy to explain to our technical operators how to set up the SIM cards. Once the SIM is activated, we can then use EMnify's OpenVPN to create remote sessions for configuring the charge points and managing the commissioning flexibly from our office."

- **Federico Rivelli**Project Manager, Enerhub

After the chargers are up and running, remote access via OpenVPN additionally allows Enerhub to perform multiple diagnostic and maintenance tasks like downloading application logs and hardware rebooting – fast and efficiently from afar. "The other way would be sending our technical team on-site, which is much more time-consuming," he added.





## Managing SIM and charger communication from a single pane of glass

As a company in a growth phase, Enerhub also needs a solution that provides maximum flexibility and control over SIM and charge point communication to speed up troubleshooting and supply chain processes.



"With other mobile network operators, it is not easy to manage the SIM cards in a self-service manner using a digital platform like EMnify. The EMnify Portal is like a CRM system for our SIM cards."

Federico Rivelli
Project Manager, Enerhub



Having all information regarding SIM inventory and associated charging stations in one place



Easy self-order and activation of SIM cards based on Enerhub's exact needs



Monitoring connection status and data usage in real-time

"Oftentimes, we know exactly which network is best at the charge point location. EMnify's operator blocklist function allows us to select our preferred network as needed," said Giuseppe Danza.







