# PRODUCT **BROCHURE**

2025



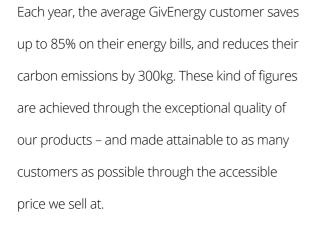


# About Us

GivEnergy **About us** 

# Who are we?

GivEnergy is the largest British owned manufacturer of residential and commercial battery storage systems. Our services allow customers to take control of – and save money on – their energy spend end-to-end.



#### The GivEnergy mission

Empowering energy freedom for all

To create a reliable and accessible smart

#### The GivEnergy vision

and data.

ecosystem to reduce energy

costs and environmental impacts,
through education, technology

# Why work with us?

# Expert, friendly support

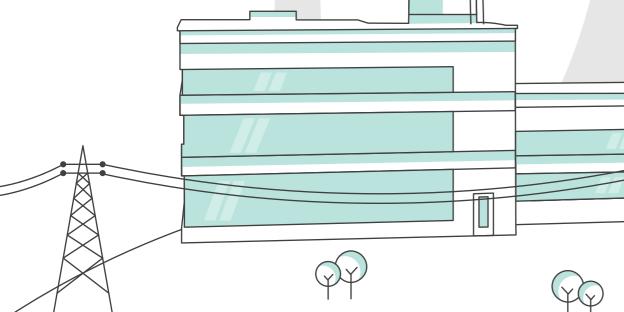
If you need help, we've got you covered. Our technicians are only ever a call away, and we have field engineers primed to step in as needed. So, you're working with a UK company that's with you every step of the way.

# End-to-end ownership

At GivEnergy, we don't just buy someone else's product and white label it. We control the research, development, and manufacturing end-to-end. This ownership ensures premium quality. Each component works smoothly, with zero compatibility issues.

# Thriving network of installers

Over 350 approved installation companies are approved to fit our products. These kinds of numbers are a reflection of the popularity and ease-of-use of the GivEnergy range. For you, though, they also represent a quick, easy energy project.





# Introduction

# Join the clean energy revolution



# Our range includes:



#### Inverters

The brains of your system, connecting any renewables, batteries, the grid, and the home



#### **Battery storage systems**

Where your energy is stored, to discharge into the home and/or into your EV



#### **EV** charger

An adaptive solution taking power from your preferred source – grid, renewable, or battery



#### **Energy management software**

A powerful web portal plus supporting app to track and manage your energy usage



#### A host of supporting accessories

Smart plugs, dongles, and more – all designed to complement your system

Together, these products create an end-to-end ecosystem for you to control your energy while cutting your carbon emissions.

# Run your home on battery power

With a GivEnergy system, you can run your home on sustainable battery power. Charge your home battery using renewables or off-peak grid rates. Then, use the energy stored in your battery to cheaply and cleanly power your home.



Drastically reduce your energy bills



Cut your home's CO2 emissions



Protect your energy supply from disruption



Integrate with smart tariffs to continue cutting costs



Enjoy cheap energy day and night



Maximise your investment on renewables



Become more resilient, and less grid-dependent



Monitor and manage the flow of energy across your home



Set custom automations using our API

# **Core Products**

GivEnergy The inverter range

# The inverter range

#### What is an inverter?

A GivEnergy inverter seamlessly connects your solar PV, storage battery, and home. It acts as the brain of your system. So, it will:

- Convert current from DC to AC
- Communicate between your various components and the grid
- Feed in data to your energy management software
- Maximise power output
- Optimally manage the flow of power

## Which inverter do you need?

Inverters come in two different types: our **AC coupled inverter**, and our **hybrid inverter**.

We recommend a different product depending on your project and existing setup.



#### AC coupled

Best for:

- Homes with an existing solar setup
- Homes using a battery only
   no renewables
- Homes using wind or hydro power



#### Hybrid inverter

Best for:

- Homes using a battery only, considering renewables in future
- Homes starting a new solar project



# AC coupled inverter

Upgrade your renewable installation. An AC coupled inverter is perfect for adding energy storage capacity to an existing renewable installation – helping you maximise your investment.

#### **Versatile**

Works with retrofits, new solar projects, and standalone batteries alike.

#### Smart

Your system knows when to store and release energy for the best rates and returns.

#### **Co-operative**

No changes required to either your solar panels or any Feed in Tariffs.

#### Fine-crafted

Compact, lightweight, stylish, and able to live indoors or outdoors.

#### Scalable

Expand your setup as needed. You can even support a microgrid or 3-phase system.

#### Clean

Your system is designed to minimise energy import and export for grid-neutrality.

## Technical specifications



#### AC coupled

- 3000W nominal AC output power
- 13A max. output current
- IP65 rating
- Dimensions 223D x 260H x 480W (mm)
- 12 year warranty

CORE PRODUCTS CORE PRODUCTS

GivEnergy The inverter range GivEnergy The inverter range



# Hybrid inverter

Just setting out on your renewable energy journey? A hybrid inverter will help you get the most from your system - for maximum energy efficiency, and maximum savings.

#### **Affordable**

We make clean energy accessible to all. Get a premium inverter, for a great price.

#### **Efficient**

Meet the energy needs of the modern home, with discharge rates of up to 11kW.

#### **Robust**

With water and dust resistance, our hybrid inverter is built to withstand the weather.

#### Safe

Your hybrid inverter offers every protection to keep your home safe.

#### Sleek

Electronic equipment needn't look ugly. Enjoy sleek, compact design.

#### Connected

In-built WiFi and LAN give you a hard-wired network connection.

# **Technical specifications**



#### Our single-phase hybrid inverter range

Perfect for the typical household where loads mainly comprise lighting, heating, etc.

#### 3.6kW - Low voltage

7500W max DC power 3600W nominal AC output power

IP65 rating

Dimensions 588 x 214D x 480W (mm)

12 year warranty

#### 5.0kW - Low voltage

7500W max. DC power 5000W nominal AC output power IP65 rating

Dimensions 588H x 214D x 480W (mm)

12 year warranty

#### **8kW** - High voltage

12000 max DC power

8000W nominal AC output power

IP65 rating

Dimensions 588H x 214D x 480W (mm)

12 year warranty

#### 10kW - High voltage

15000 max. DC power

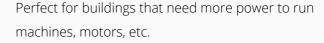
10000W nominal AC output power

IP65 rating

Dimensions 588H x 214D x 480W (mm)

12 year warranty

## Our three-phase hybrid inverter range



#### **11kW**

15kWp max. DC power 11000W nominal AC output power Dimensions 658H x 214D x 480W (mm)

#### 20kW

30000W max input power 20000W nominal AC output power IP65 rating Dimensions 658H x 214D x 480W (mm)

Please note: all stats represent the latest generation of our products.

To view stats for older generations, please visit our website.



**CORE PRODUCTS** 

GivEnergy The battery range GivEnergy The battery range

# The battery range

# What is a home battery?

A home battery stores up a supply of clean, usable energy for your home. It can take power from a generation source – such as solar, wind, or hydro – or from the grid using off-peak overnight tariffs. In the process, it allows you to save up to 85% on your energy bills.

## Our battery storage technology

**Powerful Durable** 

Your battery is made of highcapacity, energy-dense cells.

Designed for minimal heat build-up, maximum longevity.

#### Safe

LiFePO4 technology makes our batteries the safest available.

#### **Sustainable**

Fully recyclable, nonflammable, and non-toxic.

#### **Heavy-duty**

Up to 100% depth of discharge unlocks the battery's full capacity.



#### **Efficient**

Prismatic - not soft pouch cells deliver ultimate efficiency.

#### **Ethical**

Ethically sourced and cobalt-free.

#### **Economical**

Round trip efficiency of 93% means superior energy retention.

#### Lasting

Tough enough to power unlimited cycles over 12 years.

#### **Sophisticated**

Individual monitoring and balancing of each and every

## Which home battery do you need?

Our home batteries come with multiple power capacities, to meet the needs of any customer. Your installer will be able to recommend the product you need after chatting more about your property and your energy-saving goals.



#### Giv-Bat 2.6

The perfect starter battery for small homes.

- 2.6kWh / 51Ah capacity
- 80% depth of discharge
- IP65 rating
- Dimensions 299H x 205D x 480W (mm)
- 12 year warranty



#### **Giv-Bat 5.12**

The next gen of the 5.2 - offering 100% DoD within a more compact product.

- 5.12 kWh / 100 Ah capacity
- 100% depth of discharge
- IP65 rating
- Dimensions 338H X 242D x 480W (mm)
- 12 year warranty



#### Giv-Bat 9.5

Our most powerful single home battery, with 100% DoD.

- 9.5 kWh / 186 Ah capacity
- 100% depth of discharge
- IP65 rating
- Dimensions 576H x 225D x 480W (mm)
- 12 year warranty



#### All in One

A battery and inverter in one integrated product.

- 6000W nominal AC output
- 7.2kW @ 10s, 6.5kW @ 30s peak power
- IP65 rating
- Dimensions 1100H x 600W x 280D (mm)
- 12 year warranty



#### Stackable battery

Create the desired power capacity with a stacked setup.

- 3.4kWh per battery pack
- 10.2kWh 20.4kWh per
- 3-6 batteries can be used per stack
- IP65 rating
- 12 year warranty



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**CORE PRODUCTS CORE PRODUCTS** 



GivEnergy All in One



# All in One

Power your home for a fraction of the cost. Introducing the ultimate in smart energy management: the All-in-One.



#### Sleek

Your product is sleek, compact, and easy to install.



#### **Powerful**

Provides enough power to run even the most high demand devices.



#### **Affordable**

High quality performance, at an accessible price point.



#### All in One 6.0

A 13.5kWh LiFePO4 battery and an AC coupled inverter combined in one integrated system.

- 6000W nominal AC output power
- 7.2kW @ 10s, 6.5kW @ 30s peak power
- IP65 rating
- Dimensions 1100H x 280D x 600W (mm)
- 12 year warranty

# Technical specifications



#### All in One 3.6

The might of the All in One, held in check. The AlO 3.6 is a G98 certified version of the product limited to 3.6kW on-grid. This means it can be installed without prior permission from the DNO, or in areas where there are grid limitations.

- 13.5kWh battery capacity
- 3.6kW peak power on-grid, 6.0kW off-grid
- IP65 rating
- Dimensions 1100H x 280D x 600W (mm)
- 12 year warranty



#### **Giv-Gateway**

A companion gateway enabling seamless switching between grid and battery, keeping you powered during outages. The Giv-Gateway also facilitates a connection point for solar PV systems, allowing continued energy generation even without a grid supply.

- 18400W nominal AC power
- Grid services ready
- Pre-installed energy meter
- 20ms switchover time
- Dimensions 410H x 370W x 190D (mm)
- 12 year warranty

CORE PRODUCTS

GivEnergy **EV charger** 

# **EV** charger

# An EV charger that ticks all the boxes

#### Compact

Sleek, compact design to allow for installation in tight spaces.

#### **Durable**

Tough enough to live indoors or outdoors – rain or shine.

#### **Future-proofed**

Primed to charge from renewables, and compatible with most EVs.

#### **Effortless**

Quick, easy installation plus rapid plug-and-go charging.

#### Smart

WiFi integrated, app-controlled, and data-rich.

#### Accessible

Affordably priced, to make clean electric charging accessible to all.





# The EV charger with safety built-in



#### **Protected**

Integrated PEN fault protection – no earthing rod required.



#### **Access-controlled**

Use an RFID card to prevent unauthorised access to your EV charger.



#### Safe

Safety features such as overcurrent, over-voltage, and short-circuit protection.

# Technical specifications



# EV charger

- 7kW / 32A AC power output rating
- 5m charging cable length
- IP65 rating
- Dimensions 288H x 260W x 112D (mm)
- Plug and play
- App controlled
- Solar diversion

CORE PRODUCTS

CORE PRODUCTS



# String inverter

Convert your solar panel output into usable energy. The GivEnergy string inverter range fills a gap for users who may only want to generate and use solar energy — without the initial investment in battery storage.



Typically used in solar-only installations



Takes the DC energy from your full solar array to a single source



Converts that energy into usable AC for your home

#### **Features**

- Unparalleled performance capability with globally recognised branded componentry
- Remote update and control made easy with a supporting cloud portal and mobile app
- Includes in-built WiFi and LAN, for a reliable hard-wired network connection
- Comes with the newest developed AFCI tech in-built, for best-in-class protection
- Supplies the average home with ease, with a max output power of 6kW
- Over-the-air firmware updates keep your tech running smoothly
- Integrates with the GivEnergy ecosystem

# **Technical specifications**

- Available in 3.6, 5.0, or 6.0kW capacities
- 17A/17A max. input current (per string)
- IP65 rating

- Dimensions 583H x 205D x 480W (mm)
- 12 year warranty

# Complementary Products

GivEnergy PV Protect

#### **PV Protect**

Ensure safety for your solar PV system – even in the event of emergencies. With the GivEnergy PV protect, you can de-energise your solar array at the touch of a button.

The GivEnergy PV Protect acts as a "fireman's switch". So, it quickly disconnects power from your solar array in an emergency.

Without this fireman's switch, DC voltages can remain active on solar panels in the event of a fire. This active DC current makes it unsafe for firefighters to begin saving the building. So, your PV Protect isolates DC energy. And, in turn, it allows emergency services to act without risk of electric shock.



Increase the safety of homes and workplace buildings



Decrease the risk of danger in the event of a fire



Add a safety feature for the emergency services



Isolate the building's energy supply



Comply with regulations and meet grant requirements



Enable a building save during emergencies



# Technical specifications

#### **PV Protect**

- 800VDC/MPPT DC input max. voltage
- 230Vac 50 Hz single phase AC working voltage
- Safety device
- Dimensions 200H x 310W x 93.5D (mm)
- 5 year warranty

# **Smart plug**

Control your home appliances from anywhere, at any time. The GivEnergy smart plug will allow you to easily manage your devices – whether they're smart or not.

# Manage your home electricals with the tap of an app

When plugged into a GivEnergy smart plug, your electrical devices can then become app-connected. In turn, they can become trackable, remotely manageable, and integrated with your smart home.

So, you get a 'full picture' view of your various electricals – all centrally controlled from a single screen.

#### **Features**

- Turn your devices on and off as needed
- Lower your electricity bills
- Reduce unnecessary energy loss
- Create convenient 'control zones'
- React to other smart devices
- Return to a well-lit home
- Set schedules and timers to manage device:
- Control your smart plug through voice command
- Analyse device power usage
- Expand your smart home network
- Make it look like you're home when you're away
- Check devices remotely

# **Technical specifications**



#### Smart plug

- 230V AC 50Hz-60Hz input voltage
- WiFi remote control
- App controlled
- Load breakdown
- Dimensions 57H x 60W x 57D (mm)

COMPLEMENTARY PRODUCTS

COMPLEMENTARY PRODUCTS

# Electrical Accessories

GivEnergy Inverter dongles

# Inverter dongles





#### WiFi

Connect your devices to the internet for seamless interaction with each other.

Update your firmware over-the-air effortlessly.



#### 4G

Our SIM-enabled dongles allow connection using 4G, 3G, and GPRS. Suitable for social housing providers or where WiFi isn't available.

Using a GivEnergy inverter without WiFi built-in? In this case, our dongles are supplied as part of our standard packages. They give your devices internet access, for smart integration and data sharing.

- Digital monitoring through app and portal
- IP65 rated
- Easy configuration before install
- Real-time monitoring when used with the app
- Monitoring points every 5 minutes
- Built-in flash memory
- Flexible data allowances available



### **Meters**

Our metering solutions are another standard inclusion in your GivEnergy package. They collect data to display energy values and provide monitoring points for our system.



#### GEM120CT

- Bi-directional energy measurement
- Direct/split CT connection
- LCD display with clear backlight
- MID approved meter
- Accuracy class 1 according to IEC62053-21
- EEPROM memory
- Added together to monitor various loads in the home
- 100A maximum current on single phase operation

# **DC** Isolator

A DC isolator switch comes rolled in as a standard part of your GivEnergy system. This is an electrical safety device to protect your system.

- Double pole breaker
- Load protection
- Overload protection
- Nominal volts at 80V and 100A current rating
- Provides scientific arc extinguishing and flash barrier technology to give safe current interruption



ELECTRICAL ACCESSORIES

ELECTRICAL ACCESSORIES

# Software

# Digital tools to continually drive savings

Buying a GivEnergy solution? Alongside our best-in-class technology, we also offer best-in-class software.

#### **GivEnergy portal**

Our monitoring portal allows you to remotely manage your system via a clean, easy-to-use interface. You get complete control, up-to-the-minute visibility, and granular data insights.

#### **GivEnergy app**

A lighter-weight companion to our powerful monitoring portal, the GivEnergy app is built for quick, easy access to your system on the move.

# Works with your...

#### Inverter

Get power stats and explore how much energy is going in and out of the home.

#### **Generation source**

Keep tabs on the energy generated from solar, wind, or hydro.

#### Smart tariff

Built to work perfectly with smart tariffs and off-peak tariffs.

#### EV charger

Manage your charge point and display the latest information about your EV.

#### Home

Visibility on the overall energy consumption of your home.

#### **Electrical appliances**

Connect appliances to
GivEnergy smart plugs for
usage data and remote
control.

#### Home battery

Monitor state of charge, battery health, and throughput.

#### Alexa

Ask Alexa for power updates and tell her to turn appconnected devices on/off.

#### Grid usage

Track how much energy you're importing and exporting via the grid.



GivEnergy GivEnergy portal GivEnergy GivEnergy portal

# **GivEnergy portal**

Exercise full control over your energy usage. The GivEnergy portal makes energy management easy — allowing you to monitor, manage, and analyse your system in the cloud.

# Unparalleled data access

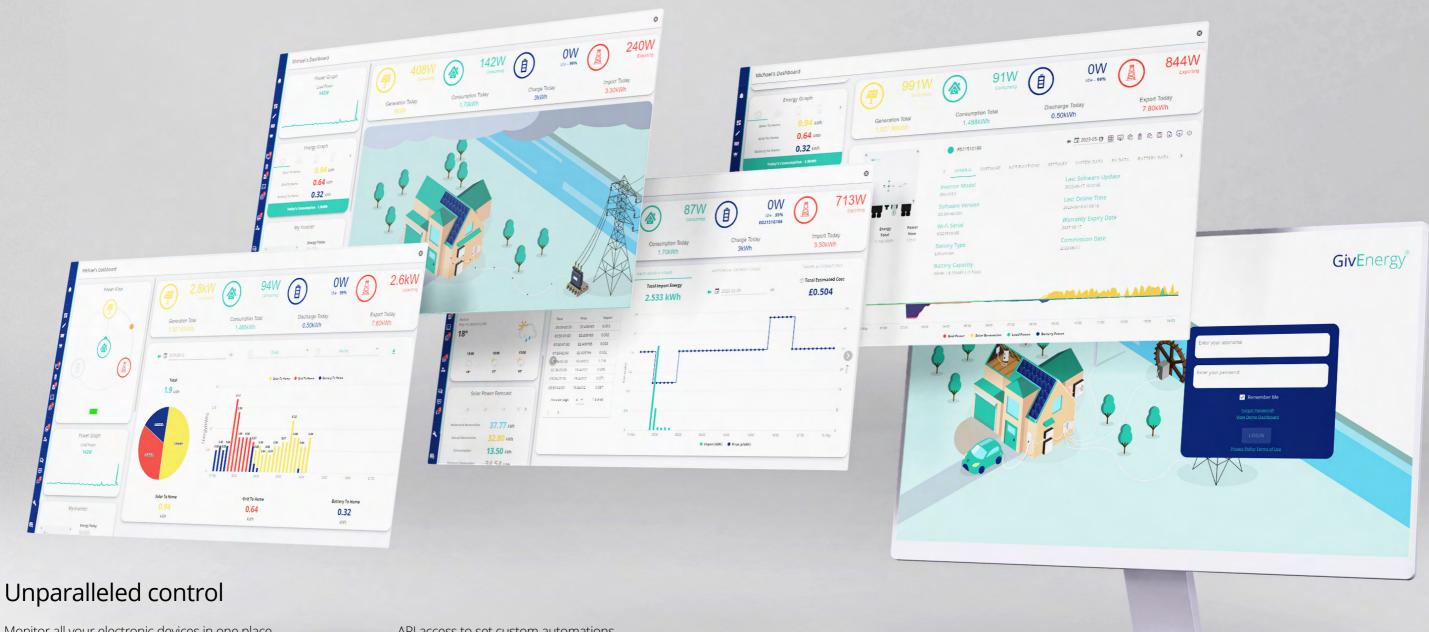
Customisable dashboard unique to you and your setup

Easy to use, remotely updated, and free forever

Quick information and detailed power values alike

Graphs displaying your power usage and energy usage

SOFTWARE



Monitor all your electronic devices in one place

Set schedules and timers to configure your energy usage around your lifestyle

API access to set custom automations

Control your system from anywhere, anytime

SOFTWARE

# **GivEnergy app**

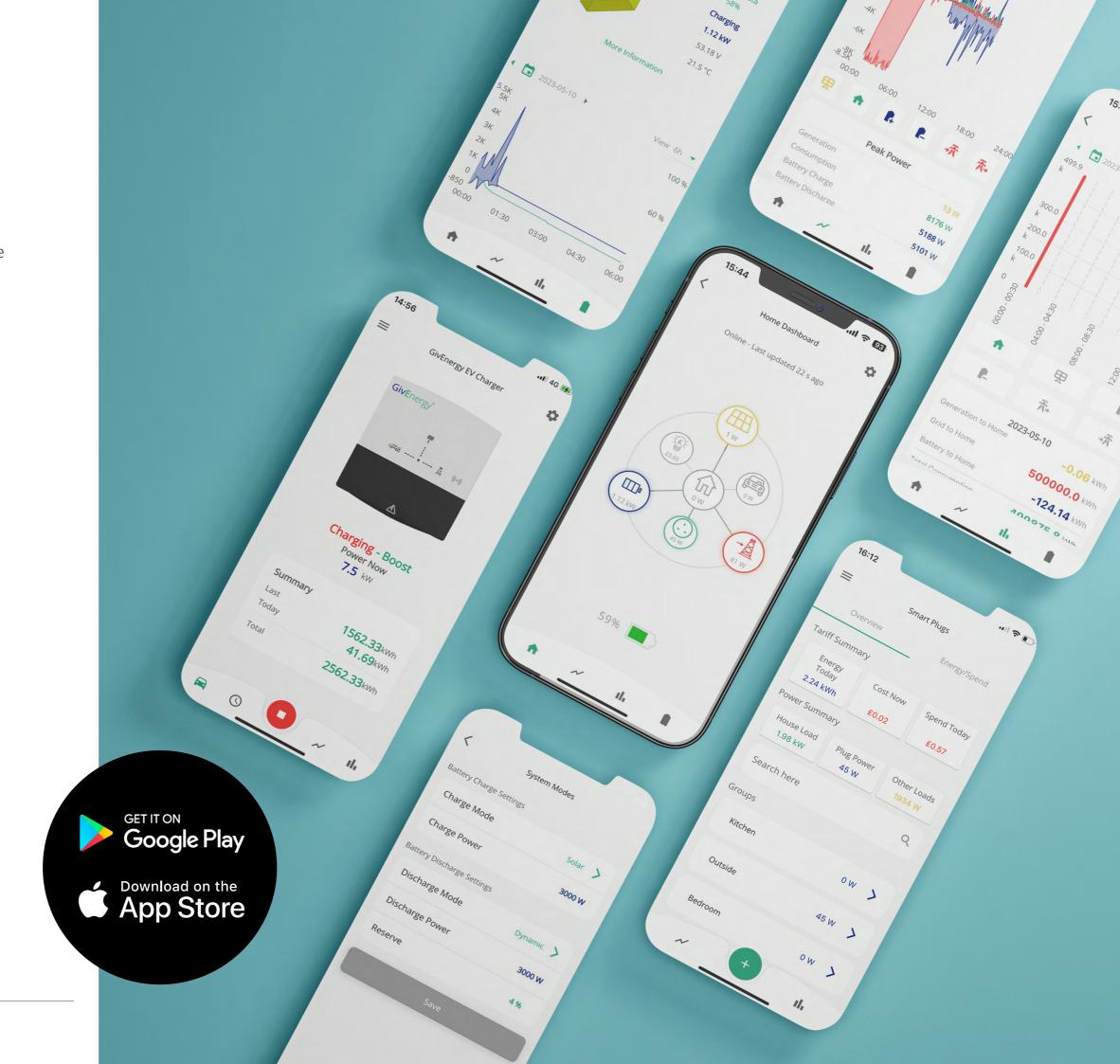
Exercise full control over your energy usage. The GivEnergy portal makes energy management easy — allowing you to monitor, manage, and analyse your system in the cloud.

# Your power, in your hands

- Grab basic information about your home energy demand, solar PV generation, and grid import energy
- Perform simple actions based on where the day is taking you
- Continually save and optimise

### Download for free

- Download from Google Play or the App Store
- Moves with you whether you're using your Android smartphone, iPhone, or Apple Watch
- Updated by a dedicated UK development team on a bi-monthly basis – to continually improve your experience



# GivEnergy Commercial

# About GivEnergy Commercial

GivEnergy GivEnergy portal

GivEnergy is the UK's no. 1 energy storage brand. We're the largest British owned manufacturer of residential and commercial battery storage systems.

The commercial aspect of our business – GivEnergy Commercial – offers flexible power solutions for businesses of any size. This spans compact 69kWh All in One systems for the SME, right up to multi MWh systems for grid-scale industry.

Whatever your desired power needs, we can tailor your BESS installation to suit.

#### Powering the likes of





Premier Inn



## A well-established provider

Our business-critical commercial solutions are already delivered and working for multiple Local Authorities, the NHS, the hospitality industry and hundreds of others.

# The best supporting software in the business

Our team of 30+ in-house software engineers provides class leading control, operation, and monitoring of your commercial BESS.

# UK support, with international reach

You'll be supported by a hands-on UK team of technicians and field service engineers.

Thanks to our global setup, we can also deploy our solutions internationally.

# The safest, most environmentally friendly cell technology on the market

We exclusively use cobalt-free LiFePO4 cell technology. So, you're getting premium, ethically sourced cell chemistry renowned for its superior safety.

#### An expert team

GivEnergy Commercial is made up of expert electrical engineers. Everyone we employ has a deep understanding of the field, coupled with years of experience in the game.

# A British-built proprietary product

Your system will be built in the UK, with fully integrated vertical manufacturing. This end-to-end ownership of our manufacturing ensures unparalleled performance capability.

# A fully customisable solution

The modular design of our systems allows us to combine as many battery packs / units as you need to hit your requirements.

# An ethical BESS partner

Our factory is ISO 9001 certified, ISO 14001 certified, and adheres to robust anti-slavery measures - all of which are externally audited.

#### WE'LL PUT YOU IN CONTROL OF YOUR ENERGY USAGE WE'LL HELP YOU EARN FROM YOUR ENERGY STORAGE SYSTEM Store energy from solar / other renewables in a large-scale Save money with peak shaving BESS custom to your building Charge your commercial batteries when energy is free / cheap, then dodge Supplement your BESS charging by taking advantage of expensive energy rates by discharging this stored energy during peak demand. low-carbon, off-peak energy using flexible tariffs Save money with grid services Run the business (and all its equipment, machinery, and Offering your stored energy to the National Grid during times of distress even its EV fleet) on your supply of stored, sustainable (via VPP schemes) will earn you an extra income on top of all the savings. battery power Track your consumption, savings, carbon offsets, and more

- all in plain sight via our cloud-based software package

# Plus, we'll help you...

- Maximise self-consumption from renewables
- Backup your power supply
- Get load shifting gains
- Increase your energy-resilience

- Flatten your demand on the grid
- Reduce CO2 emissions and energy waste
- Lessen your environmental impact
- Champion environmental responsibility

Meet the products that make it possible

Product line up **SME solutions**Product line up **SME solutions** 

## **Commercial AIO**

NEW

A compact, single unit that combines battery and PCS in one integrated system

Our All in One is the most compact, cost-effective commercial battery storage solution technologically achievable. Your energy needs are met with a single, sleek piece of kit.

- 9 high voltage battery units to provide ample power to the SME
- An integrated PCS no need to install separately
- A high-voltage box to monitor the battery and keep it within pre-set parameters
- An inbuilt SPD and DC circuit breaker making system safety even more robust



## Key features



#### Out-of-the-box convenience

Comes to you as a ready-to-go, turnkey solution that can be quickly and easily installed on site.



#### **Built-in safety**

Every practical protection has been built-in to the system. It's reliable, rock-solid, and rigorously safety-checked.



#### A true cost and space saver

By integrating all needed components into a single unit, the system represents maximum value, at a minimal size and price.



#### Simple & user-friendly

Effortless operation, plus easy cloud control. There's no simpler way to get started with commercial battery storage.

#### PLUS A HOST OF EXTRA BENEFITS

- Parallel option, install 1-6 units
- ▼ High flexibility for various loads
- Comprehensive mix of communication modes for monitoring
- Transformer-less design for the lightest, most sustainable system
- Multiple high-efficiency operating modes
- Pre-installed in our UK manufacturing facility with no custom work required

#### **TECHNICAL SPECIFICATIONS**

- 69kWh system capacity
- 30kW rated power
- 90% depth of discharge
- **7. -10 +55°C** (Derating below 0°C and above 45°C)
- Dimensions 600W\*800D\*2050H (mm)

Product line up **SME solutions**Product line up **SME solutions** 

## **SME** unit

A battery cabinet solution for your small to medium sized enterprise

Our SME battery system will give you the power you need to cut your reliance on the grid and make massive energy bill savings. All via a neat, customised, highly secure solution.



- ▼ The battery cabinet. Each battery cabinet contains 69kWh of batteries
- ▼ The GivEnergy EMS the computer part of your SME battery system
- **The DC cabinet** installed whenever multiple battery racks are required
- A display of each individual pack and cell status for full visibility plus extra control and safety

## Key features



#### **Expand to your desired capacity**

Up to 6 battery cabinet units can be installed together, offering your SME up to 414kWh of storage.



#### Get a quick, easy installation

Our built-in bus bar system allows batteries to simply slide into place – no additional DC or data connections needed.



#### **Power whole sites**

Coupled with our 30, 50 or 100kW PCS, the SME battery system can comfortably power your whole site.

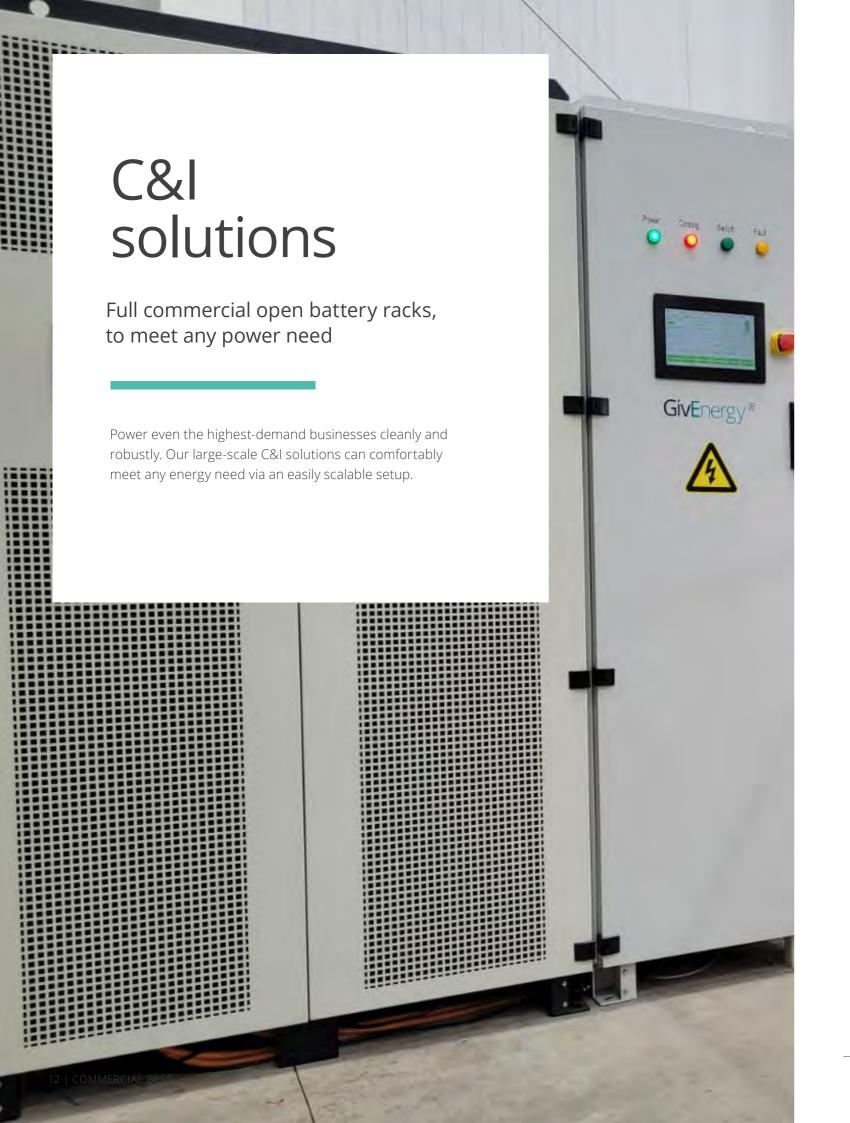


#### Built with the SME in mind

The system is lean but powerful. It's flexible enough to supply large homes, offices, or small industrial environments.

#### **TECHNICAL SPECIFICATIONS**

- 69 kWh battery cabinet
- **80%** depth of discharge
- 7.68 kWh battery
- 0°C 55°C operating range
- High voltage box



# Your C&I solution will comprise a custom combination of:

#### **BATTERY PACKS**

An accurately calculated number of high voltage battery packs, providing the desired power capacity

#### **RACKING**

Neat, convenient rack-mounting customised to your space and sized to meet your power needs

#### **PCS**

Your batteries work alongside the GivEnergy PCS which manages energy conversion and grid syncing

Let's explore each contributing piece of tech in a little more detail.

Product line up **C&I solutions**Product line up **C&I solutions** 

# **Battery packs**

As part of your C&I battery storage system, you'll need battery packs. The GivEnergy high voltage battery pack works alongside our Power Conversion System (PCS) to provide a powerful, fully flexible energy storage solution for your organisation.



- Modular by design, enabling us to create a system with as many combined battery packs as needed
- Delivered conveniently rack-mounted, in a setup sized to meet your power needs
- Flexible size, voltage, and capacity options to make your solution a bespoke fit

# Key features



#### **Built-in BMS**

A built-in, multi-layer BMS offers precise cell monitoring and balancing



#### Longevity

Your GivEnergy commercial system is engineered to give 20 years+ lifespan



#### LiFePO<sub>4</sub> cell technology

Our chemistry is cobalt free and uses LiFePO<sub>4</sub> – the safest cell technology on the market



#### **Integrated EMS**

An integrated EMS allows multiple monitoring points

#### **TECHNICAL SPECIFICATIONS**

230AH / 8.8kW

**221** x 691.5 x 488.7 (mm)

**38 - 51 nominal voltage** 

-10°C - 45°C operating range

**230 - 300Ah capacity** 

Product line up **C&I solutions**Product line up **C&I solutions** 

# **Battery racking**

As part of your C&I battery storage solution, your battery packs will sit within large open racks.



- Pre-drilled fixing points on all sides make for an easy installation
- A robust steel frame keeps your solution securely housed
- Multi-point monitoring via our integrated Energy Management System

# Key features



#### **Powerful**

Each battery rack contains 200kWh of batteries. With a DC cabinet, 3 units are installed together – offering a massive 600kWh of storage.



#### Accessible

On install, the battery packs simply slide into place. Then, post-install, accessible power and data connection make for easy maintenance.



#### **Flexible**

Couple your custom-sized battery rack with a compatibly sized GivEnergy PCS, up to a maximum rating of 0.8c. (l.e., 600kWh - 500KW or 2.4MWH - 2MW.)



#### Scalable

It's simple to add more capacity in future if your energy needs change. We can expand in 200kWh increments either side of your rack.



Product line up **C&I solutions**Product line up **C&I solutions** 

## **PCS**

A bi-directional PCS converts the electrical energy between the battery system and the grid and/or load. And with the GivEnergy PCS, you're dealing with truly best-in-class technology.



- Flexible, modular, and suitable for both commercial and industrial use cases
- A built-in visual display of the operation of each PCS, also offering basic system control
- Modular construction, allowing you to install as many units as required
- Comes in 30kW, 50kW, 100kW, 150kW, 250kW and 500kW with options to combine multiple units

# Key features



#### **Protect your power supply**

Built in black start functionality provides backup power to your site.



#### Adjust to your needs

Control charge and discharge rates based on pre-defined parameters with our EMS.



#### Hybrid by design

On-grid, off-grid, and energy storage function combined.



#### **Customise your solution**

Can be installed internally or in a bespoke container to suit your space.

#### PLUS A HOST OF EXTRA BENEFITS

- Intelligent charging function with shorter battery charging path
- Enable operation with up to 100% unbalanced load for 3-phases
- Support various load types, independently or mixed
- Online seamless handover between on-grid and off-grid modes

- Autonomous energy management and operation, with or without EMS
- Active and reactive power control (instantly)
- Multi source hybrid function, enable to on-grid paralleling with diesel generator
- Comprehensive and high precision operation, fault monitoring, and recording

#### **TECHNICAL SPECIFICATIONS**

- Up to 5000W nominal AC output power
- 450-1000V battery voltage range
- 5 year warranty
- ✓ IP21 rating

Product line up **Containerised solutions**Product line up **Containerised solutions** 

### Containerisation

A fully containerised commercial battery storage system to suit your space

Compact, mobile, convenient, and fully customised to your power needs. With a GivEnergy battery storage container, you can house your critical battery assets securely. We can neatly package your large-scale commercial battery storage system in a custom-built container – giving you unparalleled flexibility on its location.



# Key features

#### Install anywhere

Need your container in a remote or off-grid location? Prefer it in a purpose-built plant room, or an existing space? Either way, we'll work with you to deploy the ideal system.

#### Peace of mind guaranteed

Your containerised system comes to you with all the necessary systems included, Class 0 fire rated, and fully insulated and lined. So, you can enjoy the most efficient operation from the off.

#### Get the power capacity you need

Containerised solutions range from 30 – 500kW power and 200 – 2800kWh capacity, within 10 - 45ft containers. For even larger storage capacity, multiple containers can be combined and stacked.

#### **Expert consultation included**

We'll work with you to ensure that regulations, cooling requirements, and access are considered in your system design. We'll also install, test, and commission the system as part of the process.

#### PLUS A HOST OF EXTRA BENEFITS

- Add internal and external lighting as needed
- Pick exterior colours to suit your environment (anthracite grey by default)
- Add additional outlets for a fire detection system and / or HVAC
- Request a two-storey unit to maximise the use of a smaller footprint

- Decide where you'd prefer any internal and external doors
- Protect your system with fire detection and fire suppression
- Opt for exterior cladding to blend your container into your environment
- Practical, reduced shipping weights by shipping the container and battery modules separately

#### **TECHNICAL SPECIFICATIONS**

- **▼** 30 2MW power
- 69 2800kWh capacity
- **▼** 10 45ft container
- -20°C 60°C environment range

# Protect your data centre with a UPS system

Let's safeguard your critical operations against disruption

Power outages can prove disastrous for your business. Particularly when your operations are critical, failure just isn't an option.

Enter GivEnergy Commercial. Alongside our premier commercial BESS portfolio, we offer a fully integrated UPS system that will ensure maximum resilience, with a minimal footprint.

#### **Commercial battery storage**

- Our enterprise-grade BESS solutions allow you to strategically run your organisation on battery power
- You get a low-cost, low-carbon, and ultra-reliable alternate energy source available to switch to as and when you need it
- Charge the battery system from renewables or from cheap off-peak rates
- Discharge your battery system to meet peak energy demands and dodge expensive rates





#### **Commercial UPS system**

- Our commercial UPS works hand-in-hand with your BESS
- The UPS system will secure your power supply to ensure constant power even in the event of an outage
- Your data centre is protected against blackouts, and you operate independently from the grid when you need to
- Area-wide protection, seamless integration, and 100% uptime

WE'RE ALREADY POWERING THE LIKES OF





## Premier Inn

# WE CAN DELIVER COMPACT UPS SYSTEMS THROUGH TO INDUSTRIAL, MULTI-MWH SOLUTIONS



#### SME unit

A compact yet scalable solution - 64kWh per battery cabinet



# Containerised system

Customisabe containers offering 30 - 500kW power, with 200 - 2800kWh capacity, in a 10 - 45ft container.



# Commercial All in One unit

A single system combining battery and PCS, offering 30kW rated power.



# Scalable battery racks

A single system combining battery and PCS, offering 30kW rated power.

# PROJECT SPOTLIGHT: PROTECTING PATIENTS, DEVICES, AND DATA WITH A GIVENERGY COMMERCIAL UPS SYSTEM

"The GivEnergy team have been incredibly successful and helpful during the course of this [UPS] contract. We have delivered what is quite a unique solution in a very complex site.

In terms of being flexible and professional in their approach to help meet our needs, they were second to none.

GivEnergy are the perfect partner to facilitate the installation of innovative battery systems."

George McCracken - Project Lead - UPS for the NHS



#### YOUR TRUSTED CRITICAL POWER PARTNER

- **1.** Get in touch with the GivEnergy Commercial team via the webform on this page
- 2. We'll follow up with you to learn more about your project and your critical power needs
- **3.** After taking more details, we'll use our proprietary system-sizer tech to recommend the best solution for you and provide a quote
- **4.** Next, our experts will attended your site to provide a consultation service, assess any potential problems, and devise the fastest, most efficient implementation plan
- Last, we'll install and commission your custom-sized BESS and UPS system



#### **OUR TRIED-AND-TESTED METHODOLOGY DELIVERS:**

Improved energy efficiency



Optimised on-site generation



Reduced power expenditures



Quality assurance and regulation compliance



Efficient, purpose-built cooling



Low-carbon power resilience

# Let's talk UPS system projects.

www.givenergy.co.uk commercial@givenergy.co.uk 01377 252 874

Product line up **Energy management**Support and FAQ

## Cloud software

Easily control and monitor your energy system in the cloud

When you buy a commercial system from GivEnergy, you're also getting advanced data monitoring services.

All data from the Power Conversion System (PCS), the battery packs, and metering are reported regularly to the GivEnergy cloud. You get:



#### **API** access

All information is also available via API, to allow full integration into your building management system.



#### **Data access**

As well as broad power and energy values, you also get granular data such as cell voltages and pack temperatures.



#### Remote control

Mode selection and timed control are available via the web app, enabling a full remote monitoring platform.

# Support and FAQ

#### What types of businesses can benefit from commercial battery storage?

Any business or organisation, in any industry. To list a few examples: farms, office blocks, factories, hospitals, council buildings, hotels, leisure centres, fire stations, large domestic residences even – anything! If your business uses energy, it will benefit from commercial battery storage. And anywhere a battery would add value, our solutions are scalable and can fit in.

#### How much energy can you store with a commercial system?

There's no real limit. You can store as much energy as you require and the systems are scalable. So, that's a very flexible answer depending on the size of the battery we're talking about.

As a real-world example, a large current project is a 4.8 megawatt hour (MWh) solution with 4 megawatts of power – that uses 8 of the 500kW PCS's in that system. However, that by no means represents a limit. We can scale up (or down) based on your power needs.

#### How long will a GivEnergy commercial battery last?

The warranty on the commercial battery is for 10 years, with at least 70% battery capacity after that period. It's worth noting, though, that all of the products across the GivEnergy range are designed and manufactured for a 20 year lifespan.

#### Does GivEnergy come and help with the install of the commercial system?

Yes we do. For the larger systems, we include commissioning.

Your installer – whoever that is – will come and fit the system for you. But GivEnergy Commercial will attend and make the final DC connections, programme the EMS, make sure everything is reading and operating correctly, and then we can also offer a demonstration to the end user as well.

#### Are the commercial solutions IP rated?

The individual components are IP rated for indoor use only. If we have a containerised solution, that is of course totally IP rated. So, that can be outside and that will be delivered fit-for-purpose.

#### Do the commercial batteries need to go in a container?

No – not at all. The main thing for the batteries is that they need to be kept dry. The actual individual components are IP21 or above. (Depending on which component we're talking about.) The overall system though does need to be protected from the elements.

So, it would need to go either inside, or in a container. There is no problem at all in the system going in a warehouse, a plant room, or a service cupboard. The only key requirement here is that we need to make sure the temperature is kept within the allowable tolerances and the access should be restricted.

Because these batteries operate at a high voltage, they can be quite dangerous for anyone who's not trained

Because these batteries operate at a high voltage, they can be quite dangerous for anyone who's not trained and suitably qualified to work with them. So, they should be kept behind a locked door or cases.

#### Do the commercial batteries require maintenance?

Not really. They all have the online monitoring, and they all report up to the portal. The end user, the installer, and GivEnergy alike can see all of that information.

Here at GivEnergy, we'll generally know if there are any concerns even before the end user does, and can react to them accordingly.

The real maintenance piece is just making sure that:

- Ventilation and filters are clear
- There's nothing stored around the batteries that shouldn't be

Then we can offer a maintenance service if required. So, we can put together a maintenance plan along with a schedule of all the items that we'll come and check. We can do that on a 6-monthly, annually, or bi-annually basis depending on your requirements.

#### Can commercial storage be used with PV or wind?

Absolutely. We can work with any form of generation no problem at all. All of the commercial solutions currently are AC coupled type. So, they can work with solar PV, wind, hydro, and potentially even generators or gas-powered CHP plants.

We just meter the generation and meter the incoming grid supply. Plus, we can actually work as an off-grid solution. There are a few sites out there that are already working entirely off-grid. (That's the battery, the generation plant, and a diesel or gas-powered generator.)

So, commercial storage can work on or off grid with any generation source.

#### What if I have a question not covered above?

Give us a call or email – we're a friendly bunch!





#### Work with the best in the energy management business

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