



# Thinking about solar PV for your farm or business?

Llangattock Green Valleys Community Interest Company is offering its members<sup>1</sup> the chance to join Reach For The Renewables, a new solar PV group-buying scheme aimed at farms and businesses, as well as schools, halls and other community buildings. Reach For The Renewables offers:

- market-beating prices (see page 2 for details)
- installation by a reputable and well-established firm of MCS-accredited installers
- quality Sharp panels, assembled here in Wales.

Through Reach For The Renewables you can:

- benefit from rock-bottom prices and group buying power: the more people who join, the cheaper it becomes
- choose the solution that's right for your roof space and budget, with systems ranging in size from 18-217 panels (4.14kW – 49.91kW)
- help your community: a proportion of the admin fee charged for each installation will go towards developing more local renewable energy projects.

## Why choose Solar PV?

- solar PV generates free electricity that you can use – and that means reduced electricity bills
- cash back for the next 25 years through the Government's Feed In Tariff scheme. For schemes

with a total installed capacity of 4kW-10kW this currently pays 37.8p for every kWh of electricity you generate, with larger schemes (10kW-50kW) earning 32.9p/kWh<sup>2</sup>. PLUS you receive an additional 3.1p/kWh for any electricity you export to the National Grid. What's more, this money is tax free and index linked for the life of the FIT scheme.

As the example below shows, over the guaranteed 25-year lifetime of the panels and the tariff, a typical 11.96kW system would more than triple your investment – equivalent to earning 12% interest per annum.

1. This offer is only available to LGV members. To become a member, visit [www.llangattockgreenvalleys.org](http://www.llangattockgreenvalleys.org) and download our membership form.
2. For larger schemes this drops to 19p/kWh (50-150kW), or 15p(150kW-250kW).

### Example – 11.96kW system (52 panels)

System cost	£33,990
Income from generation tariff	£3,545
Income from export tariff	£167
Fuel bill savings	£500 (min.)
Total annual income and savings	£4,212
Payback period	8 years
Lifetime benefit (25 years)	£105,293
<b>Total profit over 25 years</b>	<b>£71,303<sup>3</sup></b>

3. Figures calculated using the Energy Saving Trust's cashback calculator ([www.energysavingtrust.org.uk](http://www.energysavingtrust.org.uk))

In association with



REACH FOR THE RENEWABLES

**FUSELAND** Renewables Limited



## Market-beating prices

The table below gives guidelines prices for commercial schemes, starting with a minimum 18-panel (4.14kW) system. The table also shows the benefits of group buying: the more participants, the cheaper it gets – although on larger installations (10kW+), economies of scale kick in on individual projects, so the price is the same whether it's for one installation or 10.

**Prices quoted are per installed kilowatt and include a 3% administration fee and standard scaffolding costs, but not VAT, which is charged at 20% for commercial schemes.**

Please also note that these prices are subject to survey: every commercial scheme is different and

requires a bespoke solution, so your final quoted price will depend on things such as ease of access and whether any additional wiring work is required.

In addition, schemes of 10kW and above require an application – called a G59 – to the District Network Operator (DNO). This involves additional work and costs, which are reflected in our list prices. In some instances, the DNO may also require a G59 for smaller schemes – for example if you already have some renewables in place. The site survey will determine whether a G59 is needed.

We are confident that our prices represent excellent value, but please compare them with other installers to make sure you are getting the best deal.

Install size (kW)	G59 application required	Number of installs (price per installed kW)	
		1-4	5-10
4-10	No	£3,090.00	£2,978.76
	Yes	£3,296.00	£3,177.34
10-50	Yes	£2,832.50	£2,832.50

Prices are subject to survey and include a 3% administration fee and scaffolding but exclude VAT at 20%.

## What you get

### Site survey and detailed energy assessment

- the site survey ensures solar PV is right for your proposed site, and that your roof can support the panels.
- the energy assessment pinpoints ways you can increase the energy efficiency of your premises and reduce your energy bills further, eg through insulation or voltage optimisation (see page 3). Simple measures such as these can have a significant impact on your energy bills, so we strongly recommend that you follow up on the assessment recommendations.

### Installation by Fuseland Renewables Limited

- Bristol-based offshoot of Fuseland Electrical (established 1989), a large electrical contractor that's been installing solar PV on homes, schools, agricultural buildings and commercial premises for the past 5 years.
- MCS accredited (NIC 1756), NICEIC approved and a member of the REAL assurance scheme.

### MCS-accredited Gefran or Aurora inverters

- conversion efficiency of 96-97.8%

### MCS-accredited Sharp ND-R230 (A2) panels

- high-performance panel by leading manufacturer with over 50 years' experience in photovoltaics
- 230W power output; module efficiencies of 14%
- performance guarantees on power output of 90% for 10 years and 80% over 25 years
- 5-year product guarantee
- assembled in Wrexham. By choosing Sharp panels we are flying the flag for local industry and supporting 1,100 Welsh jobs.



## What you need

- a pitched roof facing South, South-East or South-West. Flat roofs and East or West-orientated systems are also possible but will give slightly lower yields.
- planning permission. Once the installation has been specified, you will need to apply for planning permission.

## Optional extras

### Voltage optimisation

This proven technology regulates and stabilises your local power supply to the optimum voltage required to run your electrical equipment. Most electrical equipment made in the EU is designed to run at 220V, but in the UK the nominal voltage is 230V, and in practice the average voltage supplied by the National Grid is around 240-245V (although it can be up to 253V).

This forces electrical equipment to function at higher voltages, and means it uses more power than it actually needs. By reducing and stabilising the incoming power, voltage optimisation typically achieves energy savings of around 13%, as well as helping to prolong the life and reliability of all your electrical equipment – from laptops to specialist machinery.

The voltage optimisation kit itself is a fit-and-forget, zero-maintenance solution, and is usually installed in series with the mains electricity supply, between the meter and the consumer unit/distribution panel.

Adding voltage optimisation when you install solar PV maximises your energy savings, reducing the overall

payback period for your system and improving your return on investment.

**Prices subject to survey and assuming installation at same time as solar PV.**

### Wireless generation monitor

An OFGEM-approved generation meter is installed as standard as part of your solar PV system. This meter records the amount of electricity your system generates and is typically positioned near your consumer unit.

You will need to take quarterly readings from this meter to claim your FITs payments. In addition, your inverter will have a performance display, showing how much energy you are producing on a daily basis. But as the inverter is usually located in the loft, accessing it may not be easy. With a remote monitoring device, you can check your system's performance quickly and easily, whenever you want.

**£540.00 including installation and 20% VAT (up to 20kW). Prices for larger schemes are subject to survey.**

## NEXT STEPS...

Contact us today to arrange your free, no-obligation solar PV survey

- Simply fill out the [registration of interest form online](#)
- or email [solar@llangattockgreenvalleys.org](mailto:solar@llangattockgreenvalleys.org) or call Llangattock Green Valleys on Freephone 0800 206 1915

## About Llangattock Green Valleys

Llangattock Green Valleys is a Community Interest Company (reg no 7255186) run by volunteers. LGV was set up in 2010 to manage Llangattock's participation in the British Gas Green Streets competition, which we subsequently went on to win. LGV's aims are to:

- make Llangattock a carbon negative community by 2015;
- build a community asset base that supports sustainable development;
- involve the whole community and develop a sense of pride and wellbeing;
- inspire stakeholders to promote a culture of 'walking together'.

LGV will receive 90% of the 3% admin fee for each domestic installation. Any profit will be reinvested in further community renewable energy projects that help us meet our aims.

## About Reach for the Renewables

Reach for the Renewables is a private company (reg no. 7732337) set up by Llangattock resident Michael Butterfield. The company aims to secure the very best prices on renewable technologies and to work with social enterprises like LGV to bring renewable energy within reach of more people. RFTR will receive 10% of the 3% admin fee for each domestic installation.

To find out more

Take a look at our [FAQs](#).



And finally...

Please pass this information on to your friends and neighbours. Group buying means cheaper, greener electricity for everyone who gets involved – plus your community benefits from every installation, because LGV will reinvest any profit in further renewable energy projects.