

Developing a successful community renewable energy project



Contact:
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Your speakers today



Leila Tavendale
Principal Engineer
Locogen



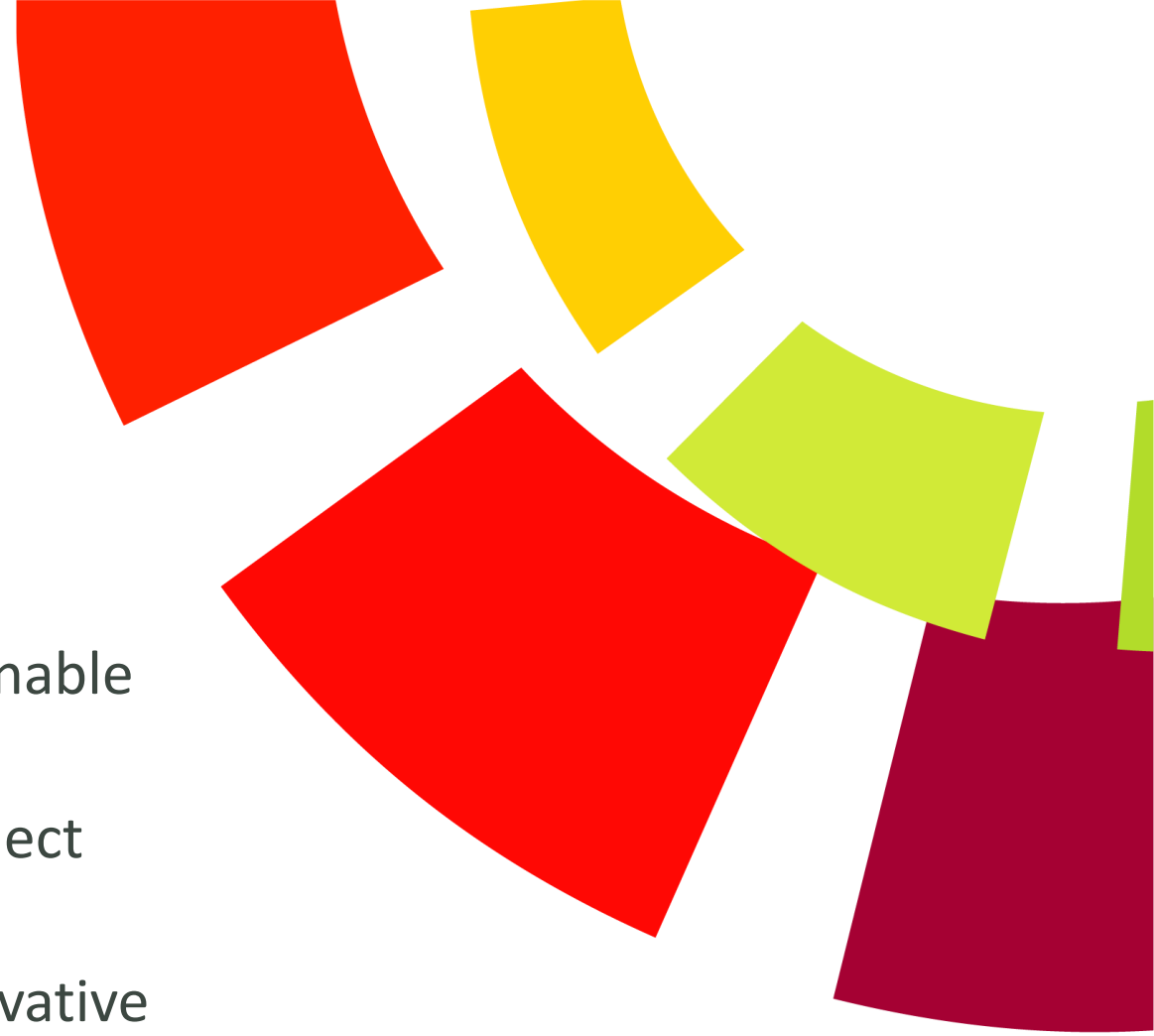
Chris Morris
Manager
Local Energy Scotland



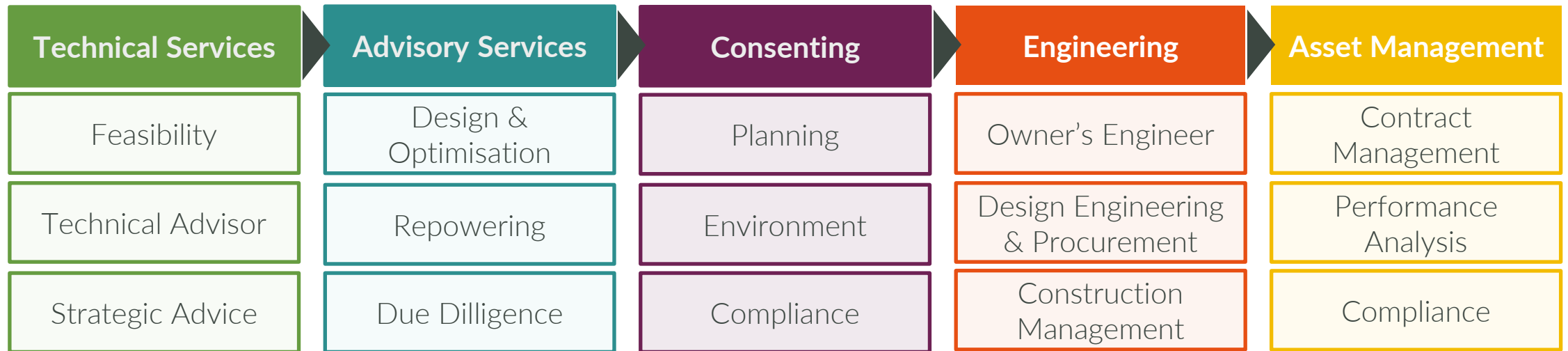
Simon Peltenburg
Chief Projects Officer
Ripple Energy

Agenda

1. Supporting communities to investigate sustainable solutions
2. Empowering communities to understand project feasibility and overcome complexities
3. Enabling community ownership through innovative business models



We support our clients to design, develop, build and operate renewable energy projects



Clients

- Developers
- Portfolio owners
- Lenders/investors
- Industrial & Commercial
- Public Sector
- Communities

Technologies

- Onshore Wind
- Ground Mounted Solar
- Rooftop Solar
- Low Carbon Heat
- Energy Storage
- Green Hydrogen

We've helped 100s of communities with their energy projects



Supporting communities to investigate
sustainable solutions



Developing a successful community renewable energy project

Chris Morris

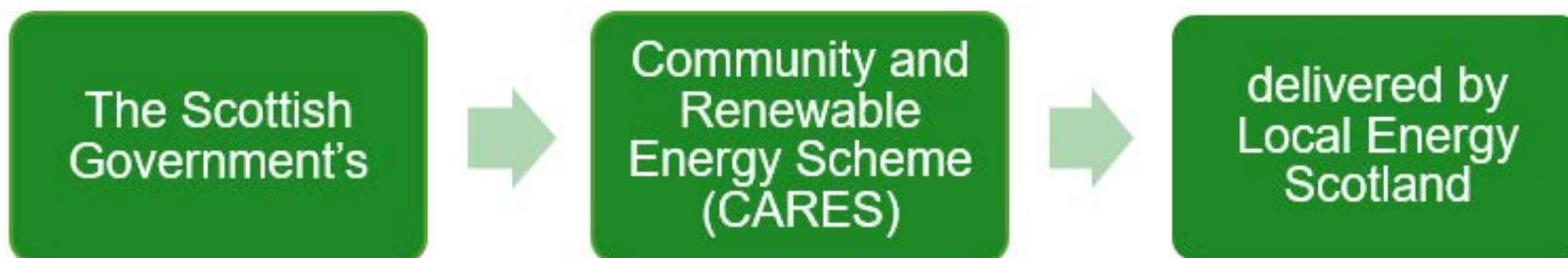


LOCALENERGY.SCOT
0808 808 2288
FUNDED BY THE SCOTTISH GOVERNMENT

CARES



CARES supports communities to engage with, participate in and benefit from the energy transition to net zero emissions.



Local Energy Scotland is a consortium comprising:

CHANGEWORKS.

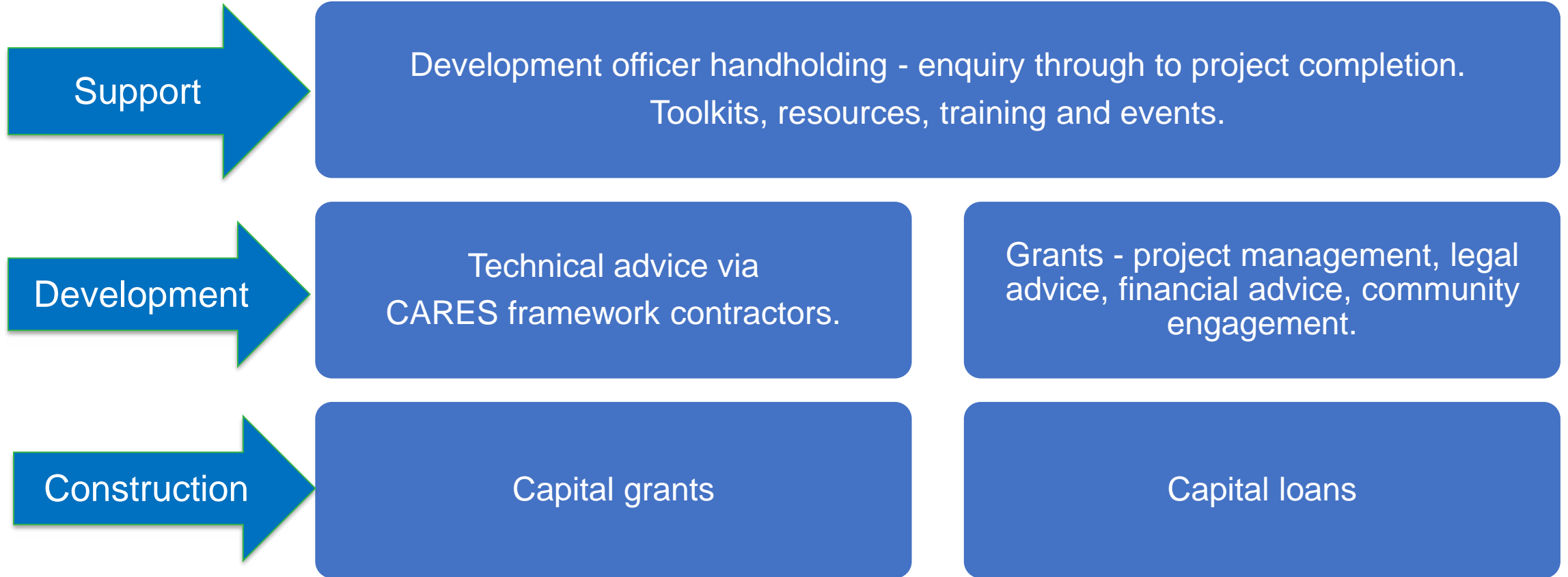


**energy
saving
trust**



CARES funding package

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Community energy projects & support



Systems

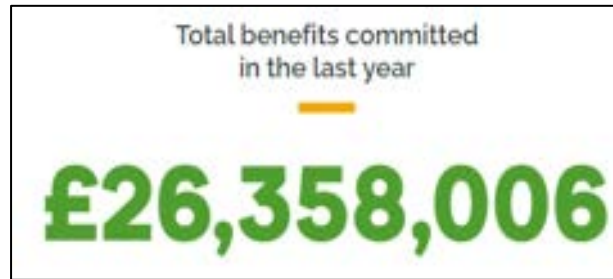
Power

Buildings

Community energy projects & support



Shared ownership



**Community
benefit funds**



**Local
partnerships**

Supporting communities to investigate sustainable solutions

LOCAL
ENERGY
SCOTLAND

Community Energy Programmes -

- Scotland – CARES via Local Energy Scotland.
- England – Community Energy Fund via regional Net Zero Hubs.
- Wales via the Welsh Governments Energy Service.

UK funding:

- Energy Redress Fund – includes a carbon reduction and innovation fund.

Join your membership organisation.

- Community Energy England/Scotland/Wales.



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Contact Us

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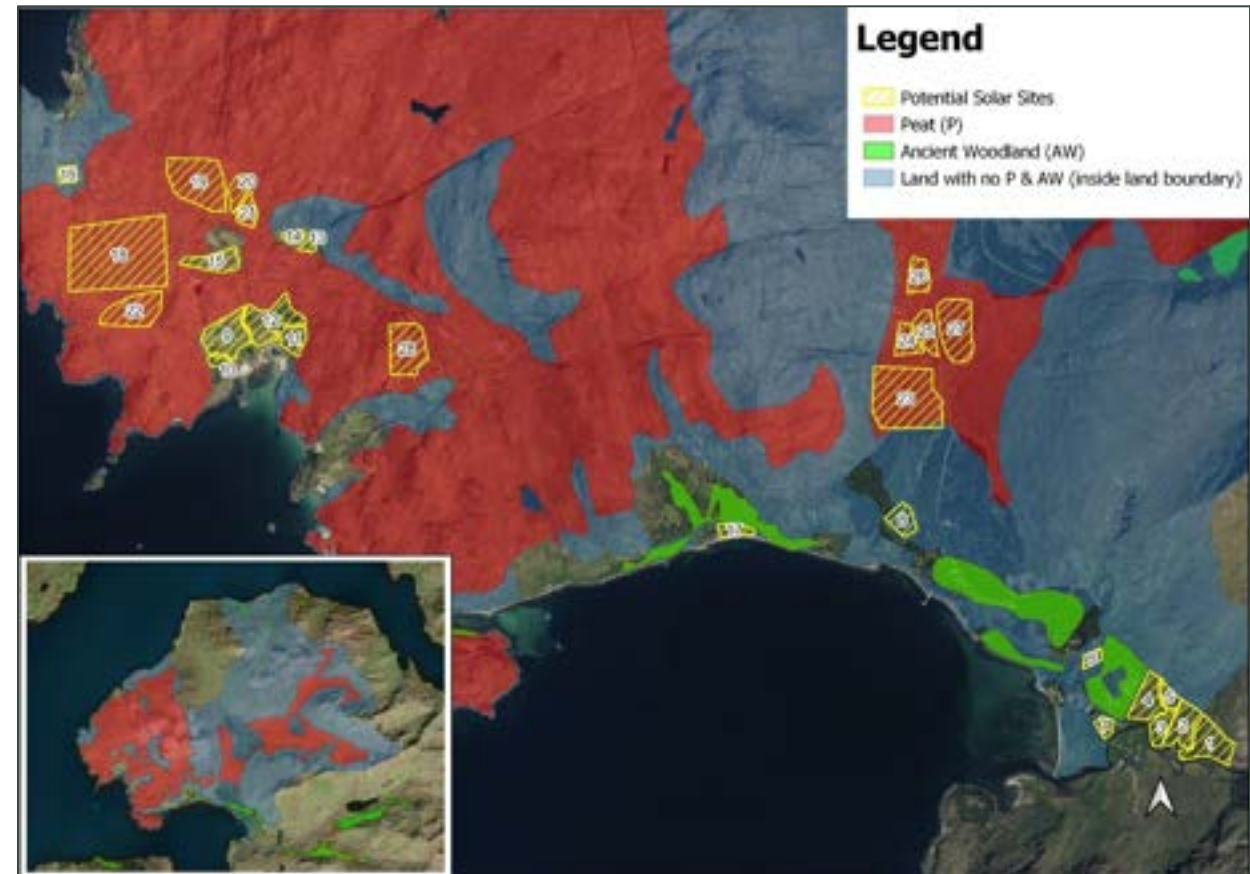
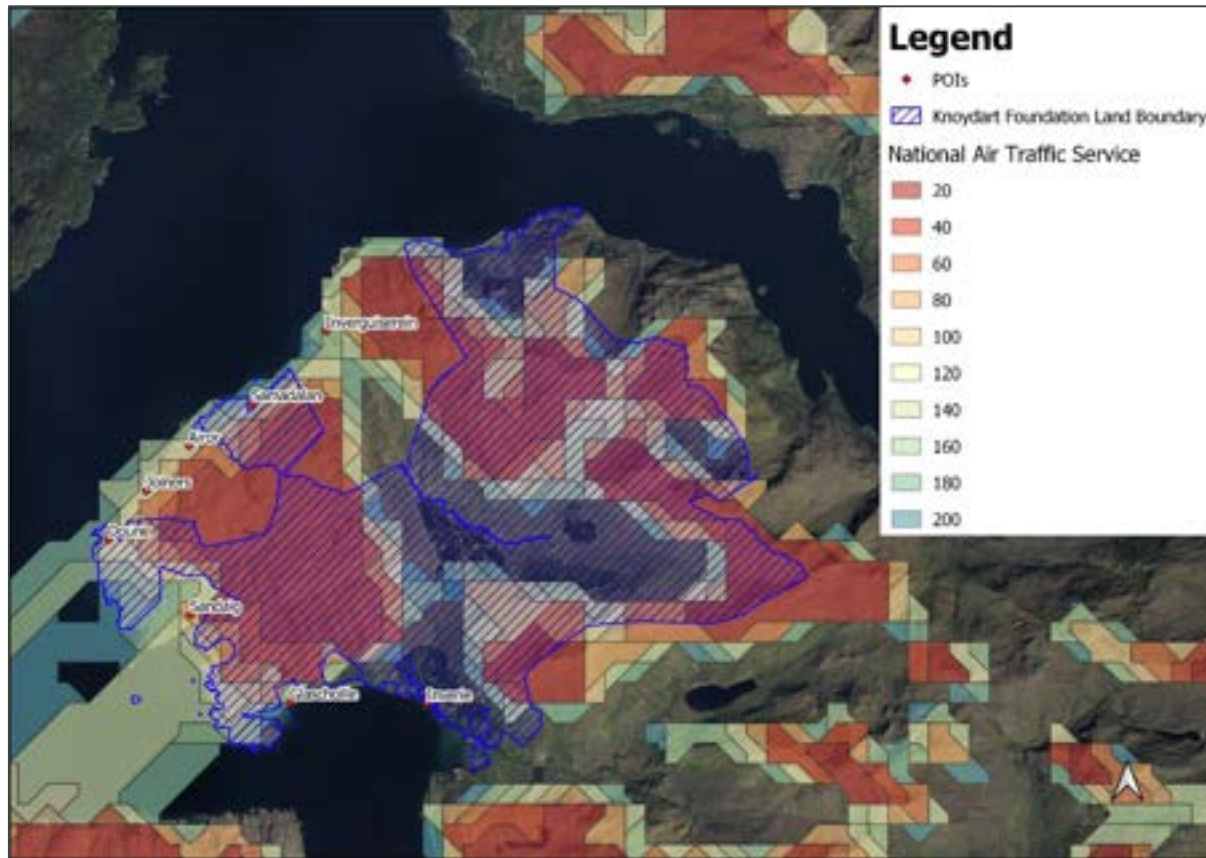
CARES





Empowering communities to understand project feasibility and overcome complexities

Identifying constraints early helps to narrow down technically feasible projects...



...and helps us to identify which parts of your site we can work with.



Obtaining a grid connection can feel like a complicated and expensive nightmare...



Grid option	DNO	Export Capacity (MW)	Connection voltage	Total cost	Cost per MW	Operational curtailment expected
A	WPD MID	0.5MW	11kV	£80,000	£160,000	No
B	WPD MID	1MW	11kV	£1,000,000	£1,000,000	No
C	WPD MID	5MW	33kV	£3,000,000	£600,000	Yes
D	WPD MID	>5MW	132kV	£21,600,000	£1,900,000	No
E	WPD SW	20MW	33kV	£3,600,000	£180,000	No
F	WPD SW	5MW	33kV	£3,000,000	£600,000	No
G	SSEN	12MW	33kV	£3,800,000	£320,000	Yes
H	SSEN	5MW	33kV	£3,200,000	£640,000	Yes

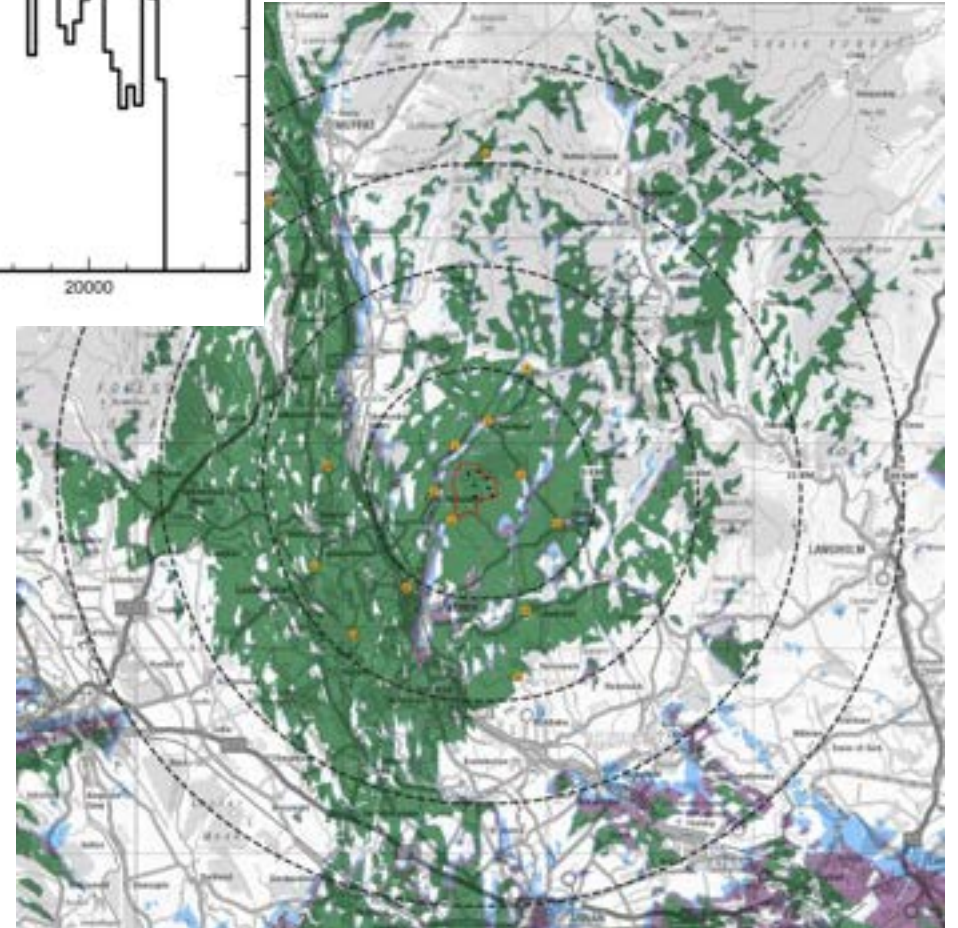
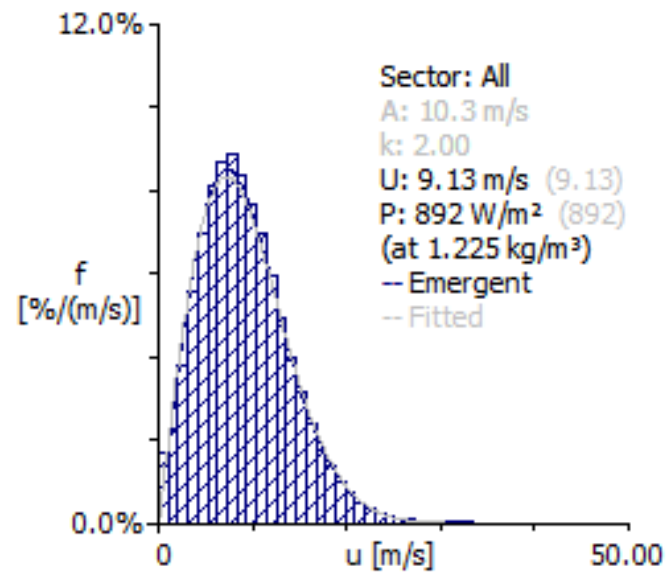
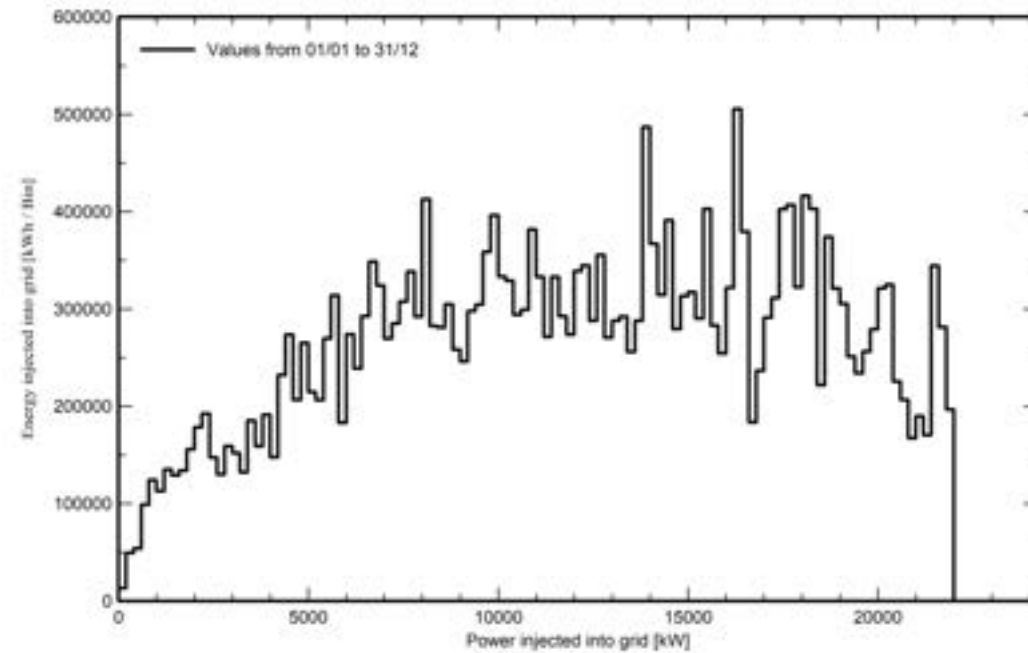
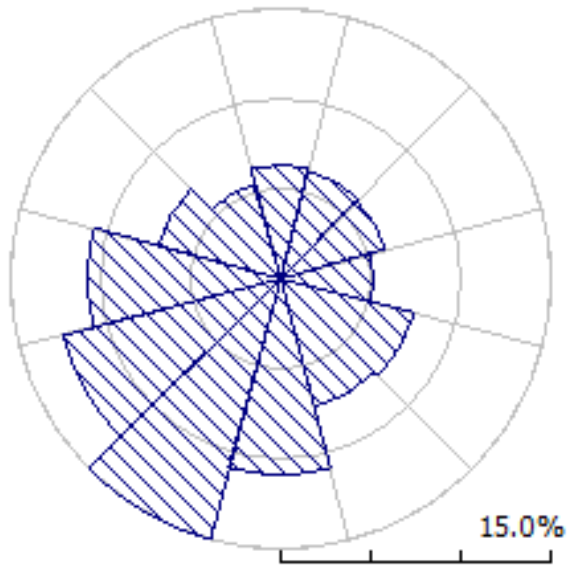
...but financial modelling can show a way forward.



	EWT DW61 (1MW)	
Site	Site 1	Site 2
Total project CAPEX + DEVEX	£2,697,767	£2,691,706
1st year gross revenue	£300,731	£333,972
1st year annual OPEX	£61,889	£63,822
1st year net revenue	£3,139	£3,680
Payback period (years)	16.1	13.6
20-year Internal Rate of Return	1.7%	3.3%
20-year Net Present Value	-£349,373	-£42,755
25-year Internal Rate of Return	2.9%	4.4%
25-year Net Present Value	-£133,800	£216,754
1st year CO ₂ savings (tonnes)	553.7	614.9

	Vestas V90 (2MW)			
Site	Site 1		Site 2	
Total project CAPEX + DEVEX	£3,280,100		£3,252,039	
Applicable from year:	Y1	Y3	Y1	Y3
Annual gross revenue	£490,269	£654,627	£525,856	£721,752
Annual OPEX	£97,188	£136,038	£99,434	£138,889
Annual net revenue	£393,081	£518,590	£426,422	£582,863
Annual CO ₂ savings (tonnes)	902.6	1200.7	968.2	1323.8
Payback period (years)	8.2		7.2	
20-year Internal Rate of Return	9.2%		11.0%	
20-year Net Present Value	£1,573,074		£2,161,568	
25-year Internal Rate of Return	n/a		n/a	
25-year Net Present Value	n/a		n/a	

Next steps



Enabling community ownership through innovative business models





Ripple

It's your power.
Own it.

www.rippleenergy.com

Ripple's mission:

To make green
energy
ownership
affordable and
accessible for
everyone



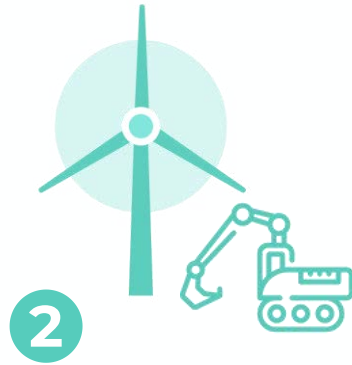
What we do



How we do it



Ripple secures wind farms + solar parks
People buy coop shares



Ripple manages project's build + operation on behalf of its owners

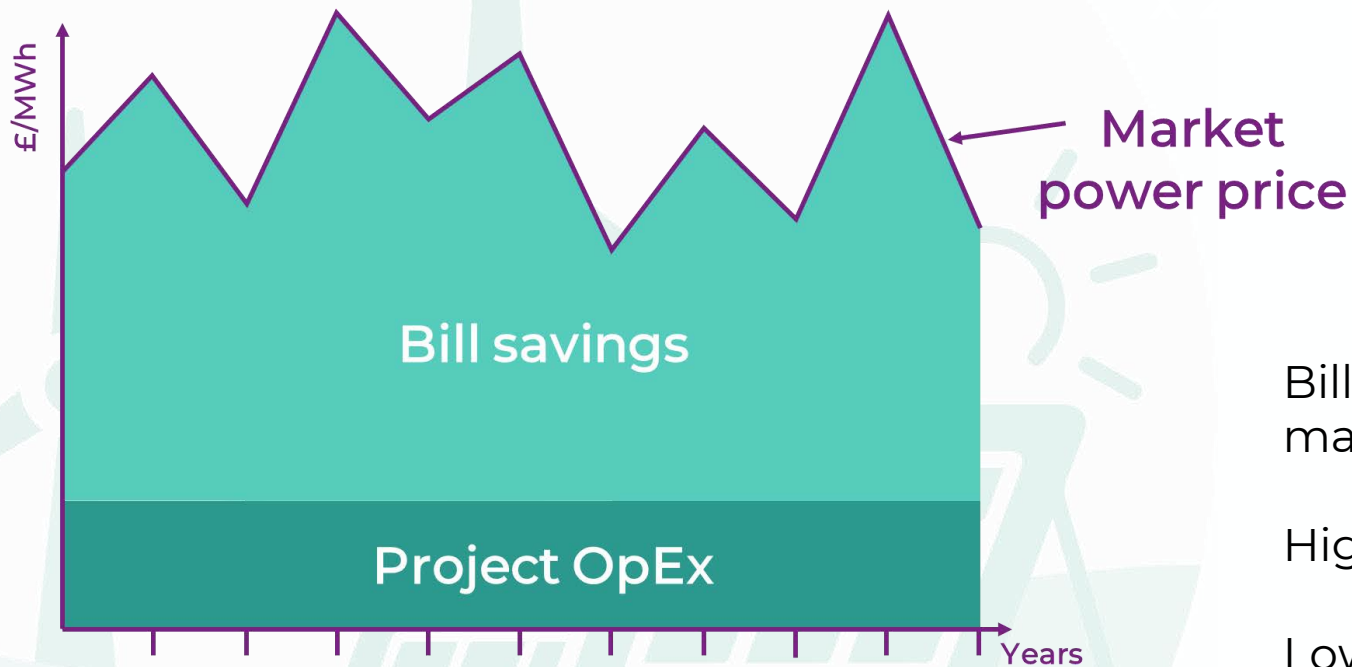


Ripple's utility partners supply electricity to owners' homes / businesses



Saving applied to owners' bill monthly for project's year life

Result = customers' bill savings



 GAS	-£39.13
 ELECTRICITY	-£81.98
08 Aug 2023	
 RIPPLE SAVING	+£62.98

Bill saving is difference between wholesale market price and wind farm's operating cost

High prices = bigger savings

Lower prices = smaller savings

Average saving = Y1 £340 / Y2 £970

What Ripple brings to the market

Greener than a green tariff

- Protects against energy price spikes
- Stable electricity prices for the long term
- Real impact + additionality
- Zero greenwash
- Genuine ownership

Cheaper than rooftop solar

- Up to 65-75% cheaper
- Portable – not tied to property
- Flexible – own as much or as little as want
- Hassle-free
- Simple, sign up in a few minutes

Professional, expert interface

- Bridge between consumers + corporate wind sector
- Turns consumers into a viable, transactable party
- Simple, workable consumer ownership
- Full customer support throughout lifetime

Progress to date



Graig Fatha Wind Farm

- 1 wind turbine
- 900 owners
- Operational March 2022



Kirk Hill Wind Farm


- 8 wind turbines
- 5600 owners
- Under construction



Derril Water Solar Park

- 42MW
- 8800 owners
- Pre-construction

Funding headlines



£80m
projects

- £4m – 13 months
- £32m – 3 months
- £42m – 6 weeks

Typical purchase

£2250
average customer
spend

- Min. ownership = £25
- Max. ownership = 120% of consumption needs

Ripple's technology platform

- Built entirely in-house
- Scalable
- Technology neutral
- Market neutral
- Customizable

How it works FAQ

Your quote for your share of a wind farm

[Back](#)

£3,118
savings over
25 years

£1,714
total cost

100%
of your
electricity


How much do you want to purchase?
(minimum of £25)


£25 1% **£1,714 100%** £2,057 120%


[Or set your own budget](#)

Costs are approximate - final costs will be calculated in the next steps.

Want more information on your bill savings? Watch our bill savings video or read the FAQs at the bottom of the page [here](#).



Cost breakdown 

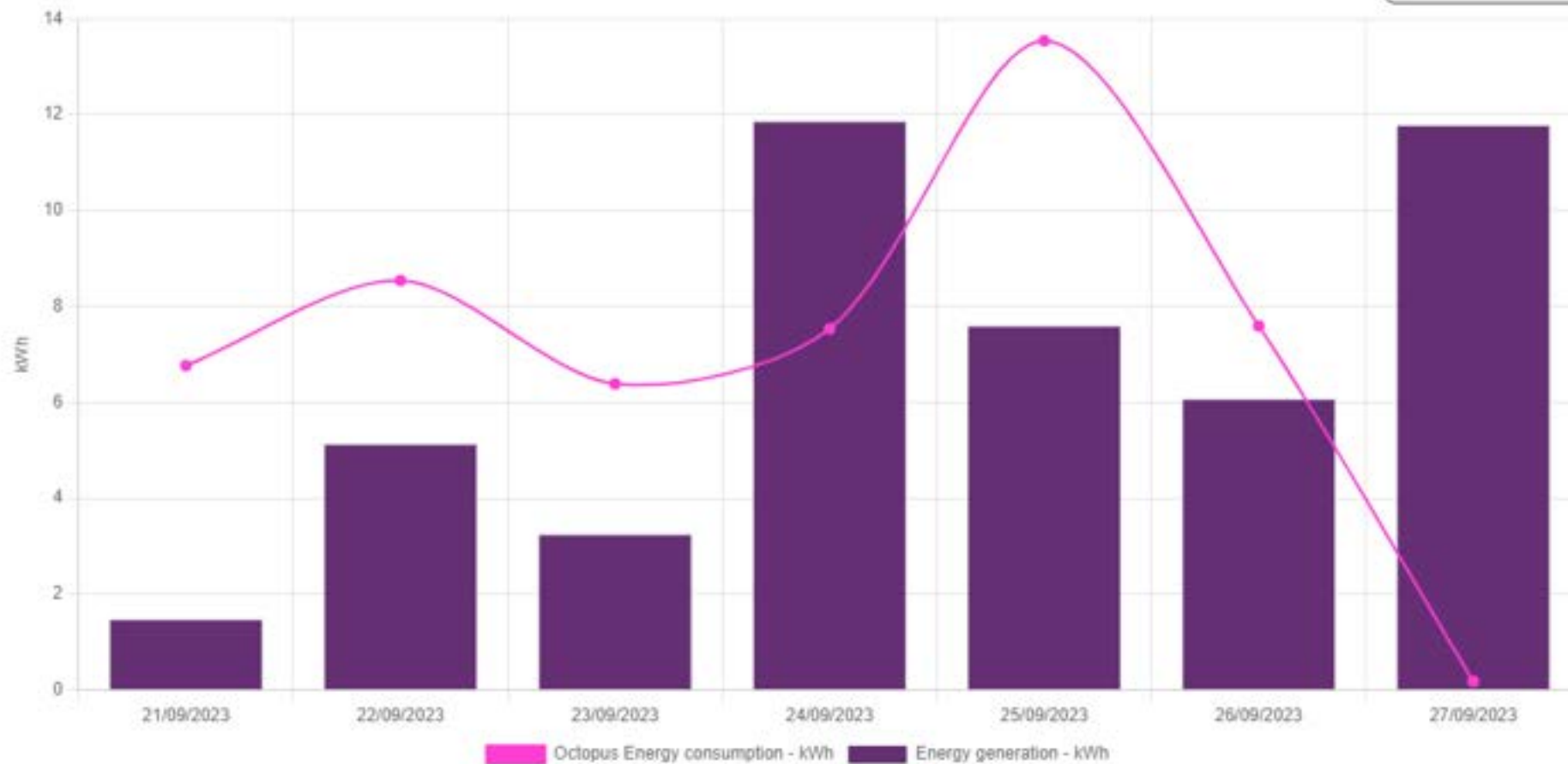
Savings based on 

Engaging data visualisation

Graig Fatha energy generation

[Chart information](#)

Last 7 days ▾



High impact marketing

High
impact
marketing



Our members

Ripple is a movement of empowered consumers

Feel part of a positive, impactful community



Trustpilot

Search for another company...

Utilities > Energy & Power > Green energy supplier > Ripple Energy

Ripple Energy

Reviews 329 • Excellent

★★★★★ 4.8

VERIFIED COMPANY

PK PK
7 reviews • GB

★★★★★ Invited 9 Nov 2021

Love the idea & slick implementation

Love the idea & the implementation is slick. With the wind farm now under construction, I am looking forward to boosting our household's green energy credentials.

MH Mr Hatlett
10 reviews • GB

★★★★★ Invited 9 Nov 2021

Great company and very approachable...

Great company and very approachable with questions and queries. Lots of information following the build of the first turbine. A solid idea with great returns.

AN Andy
2 reviews • GB

★★★★★ Invited 6 days ago

Easy and clear

Everything was clearly explained and easy to complete

Useful Share

kippie

Media + awards



2023: Technology + Business Innovation award



2023: Renewable Energy Project of the Year
(for Graig Fatha wind farm)



2021: Startup of the Year

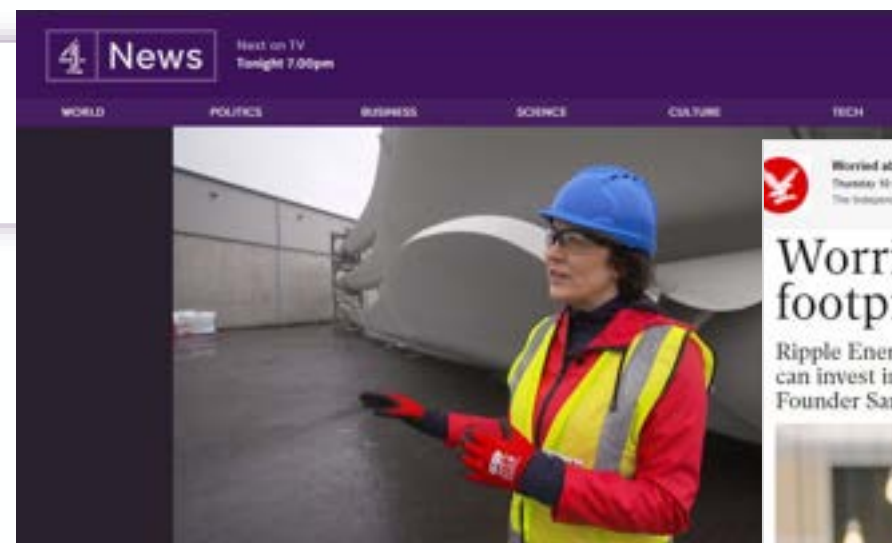
"Ripple have fundamentally re-invented the wheel with a very impressive industry disruptor business model."

BusinessGreen
Leaders Awards

2021: Entrepreneur of the Year



2019: Startup of the Year



Sarah Merrick had worked in the wind energy industry for 20 years when she had an idea for a business of her own. What if she were to build wind farms, owned not by energy companies but by householders?





Loco₂gen



Thank you for your support.

Please submit any questions using the 'questions' function.

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