Future Energy Landscapes Workshop

Bramshott & Liphook: Wednesday 28th January 2026

This write up summarises what happened and what residents of Bramshott & Liphook said during the Future Energy Landscapes workshop in January 2026. It cannot be assumed to be representative of the full range of opinions in the local community but is an accurate record of this important conversation with Bramshott & Liphook.

Please read through this report and provide your views via our short survey HAVE YOUR SAY About Bramshott & Liphook's Future Energy Landscapes Workshop – Fill in form

Workshop Background

The Centre for Sustainable Energy (CSE) developed the Future Energy Landscape workshop to enable communities to have informed conversations about their understanding and feelings about renewable energy technologies. Using data[1] and research into what technologies might be applicable to the area the workshop supports a hypothetical conversation about what scale and types of projects might be acceptable to local people and what impact would those technologies have on their local energy needs.

The workshop was funded by the South Downs National Park Authority (SDNPA). The objective was to ensure communities are part of creating a local vision for sustainable energy enabling them to play a part in shaping ambitious plans as we transition away from fossil fuels.

Why the Future Energy Landscapes workshop?

- Transforming the way that we generate and use energy is key to tackling the climate emergency.
- Generating more energy from renewable sources, so we produce less carbon is key to a transition away from fossil fuels.
- Communities need to be better informed about low carbon renewable energy technologies.
- Local people need to be consulted about the energy transition towards renewable technologies and supported to have informed discussions about the different solutions.

[1] See **Appendix 1** for details of the data, research and assumptions that have been used to build this workshop.

- Community energy should be recognised as an essential component of our energy transition, so local communities benefit from renewable energy generation.

Workshop summary

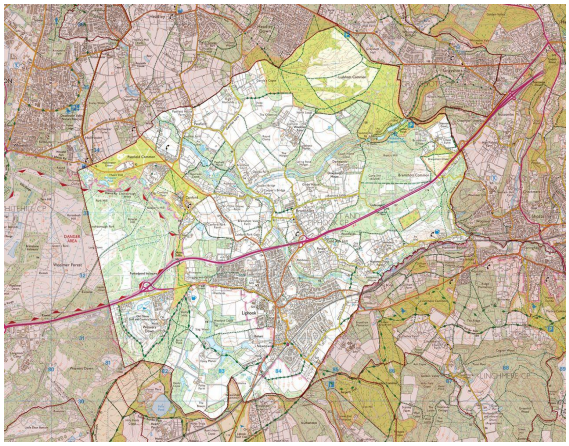
Workshop purpose: To explore the question '***How might Bramshott & Liphook power its community using locally generated renewable energy?'***

Workshop boundary: These workshops usually use the civic Parish boundary to pinpoint the discussion around an area that is familiar and frequented by the participants. It is an arbitrary boundary, but it is useful to focus the conversation on how acceptable people would find renewable technology in their local landscape.

Bramshott & Liphook: is a historic, scenic parish known for its mix of 13th century charm in Bramshott and a bustling, formerly coaching-focused centre in Liphook. Surrounded by National Trust woodlands and heathland, the area features significant military history, a vibrant long running carnival and strong community atmostphere.

Workshop process:

1. **Connect to the landscape,** considering areas that are important
2. **Learn together** about different types of renewable energy
3. Have an **informed discussion** about how we feel about the technologies.
4. Discuss if and **where different technologies might be acceptable** in the local landscape.
5. Use graphs and data, to understand how much electricity and heat the different combinations of technologies would **generate,** the impact on current local energy needs and related carbon emissions.



What was said?

After marking up maps and spending time sharing local stories about the local landscape and people's connection to it, the group watched short videos about the different renewable technologies that were locally feasible. In groups we then started a detailed discussion about the following technologies:

a) Wind Power group
b) Solar Farms (6 acres) & Large Solar Rooftop (500 meters squared) group
c) Domestic solar group
d) Domestic heat pumps group

Each group worked through the following questions:

- How do they feel about the technology overall?
- How much of the technology would they be happy to see in their landscape? (i.e. quantity of rooftops with solar or the no. of a particular sized wind turbine)
- Where might this technology be located?
- How does it impact the landscape? Who would this affect most?
- Is this a realistic suggestion and what might the barriers be to implementation?

Impact of different renewable energy technologies

Each table fed back their reflections about the specific technology, and where they felt, and on what scale, the technology might be located, if at all, in the boundary of the parish

The group's suggestions on the amount of each technology were inputted into the CESAR tool [2]. The CESAR tool, with simple graphs, shows how much energy is used by the local community, how much carbon that generation produces and how this might change by using renewable energy technologies to generate local power.

Bramshott & Liphook in numbers:

- 9,760 residents
- 4,050 homes
- 21,000 MWh electricity pa
- 17,500 tonnes CO_2 pa

The ideas of the different groups and what the CESAR tool illustrated were then offered for further comment and discussion to the wider group.

Solar Farms & Large Solar Rooftop

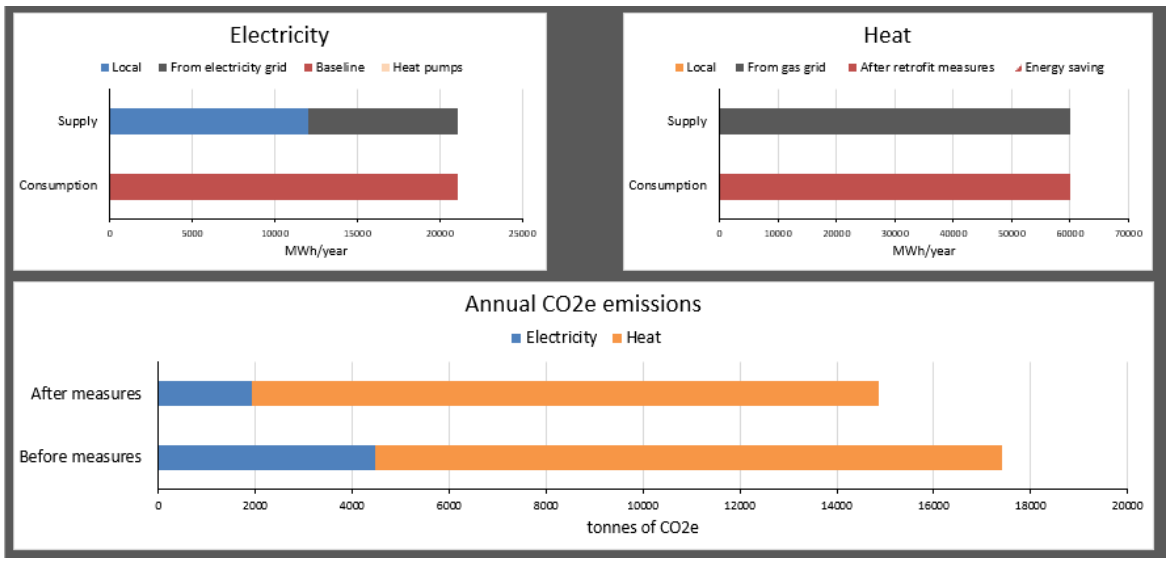
The first table looked at Solar Farms and were generally in favour scoring four out of five in terms of acceptability.

Bramshott Common was considered a potential site for 5 x 6-acre (2.5-megawatt units) solar farms along the south sides of the A3 or the railway There were some concerns about the appearance on the beautiful landscape and the impact on the ecology particularly as this area has a lot of wildlife and is an area of Site of Special Scientific Interest (SSSI). It was noted however that although there would be a visual impact the impact on wildlife would be minimal. Panels on arable agriculture that generally have a monoculture – biodiversity is improved.

A consideration was how the solar farms reach users or connect to the national grid's existing structure and substations and how long the cable would need to be to connect to those substations.

We used the CESAR tool to show the impact of this proposal on the Electricity Chart on the next page. Five solar farms in Bramshott & Liphook (22-23 football pitches) would meet nearly two thirds of the electricity demand of the parish over a year.

[2] The Community Energy Saving and Renewables (CESAR) tool was developed by the Centre for Sustainable Energy and is designed to help workshop participants think about how they would provide some or all their energy needs from renewable energy and to see the different amounts of heat or power generated by the different renewable technologies in their local context.



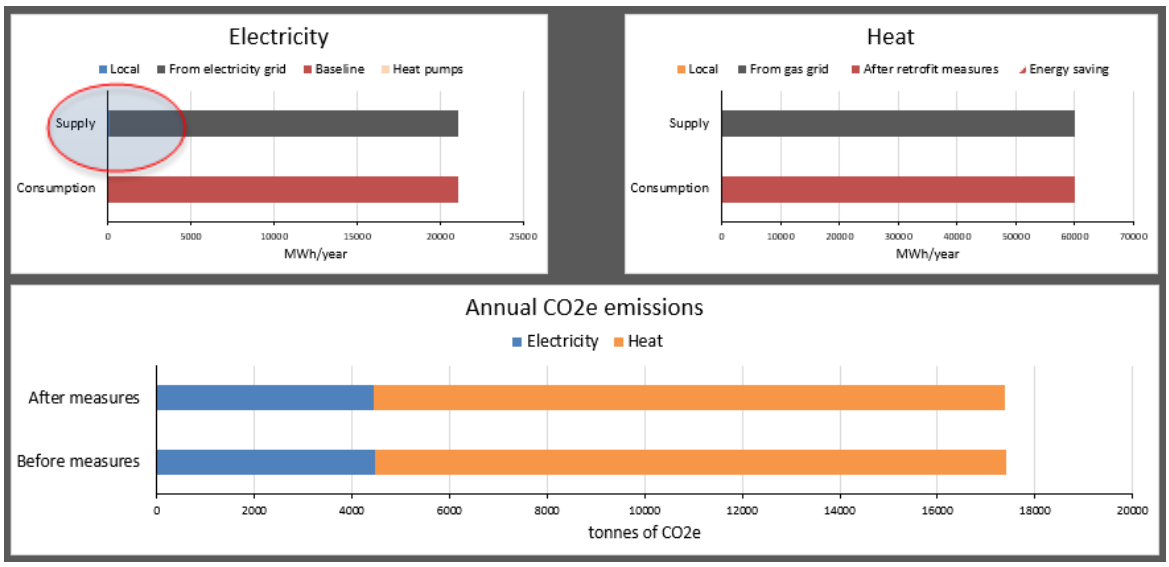
Impact of 5 x 6-acre Solar Farms on the local electricity supply

We also looked at large solar rooftops as an alternative to solar farms. These would need to be about 20 times the size of an average house. It is more expensive to put solar panels on a roof rather than the ground-mounted ones, however there are economies with scale, e.g. the Vanguard rooftop outside the parish is very large and could possibly take 2 x 2.5-megawatt units.

The Little Fish sushi supplier and English Drinks Company in the parish have large warehouses and notably large roofs and there are flats above the shops on station road that could possibly benefit directly. The schools and the equine hospital were also suggested.

Social housing that is close together was considered for its possibility as a solar rooftop project, e.g. Gunns Farm. However, the costs go up a lot because you must wire each one separately and put up scaffolding for each house.

The second electricity chart (on the next page) shows the potential impact if there was 1 large solar roof top in Bramshott & Liphook with 220 solar panels (500 square meters). The very narrow band of blue at the front of the black band (with circle around) shows that there is a small impact and that as part of wider renewable energy plan including wind etc. this roof top would make a noticeable contribution.



Impact of 1 x 220 Solar Panel Rooftop on the local electricity supply

The wider group shared their responses to this table's suggestion and discussed the following discussion points:

- Currently solar farms would not get planning permission on SSSIs. If this area were considered it would have less visual impact if it was broken up into smaller units.
- Approaching farmers who might be interested in leasing a field for solar farms. Generally, they are placed on lower grade agricultural land. Here they increase biodiversity because they are replacing a single crop with a much more diverse flora.
- There are different trade-offs with each of the renewable technologies. Rooftop solar panels are more expensive to install and harder to implement however they are less significant in their impact than ground mounted solar farms. Commercial roof, panels are flat and less visible. Solar farms are often controversial in terms of land use. Wind has a greater visual impact.

Wind Power

The second table looked at three sizes of wind turbines. These are 60 m, 100 m and 140 m from the base to the tip of the blade. In principle & depending where they are sited the group were in favour of the technology describing them as beautiful and scoring them five out of five for acceptability. The view was that the more often they are seen in the landscape the more acceptable they would become.

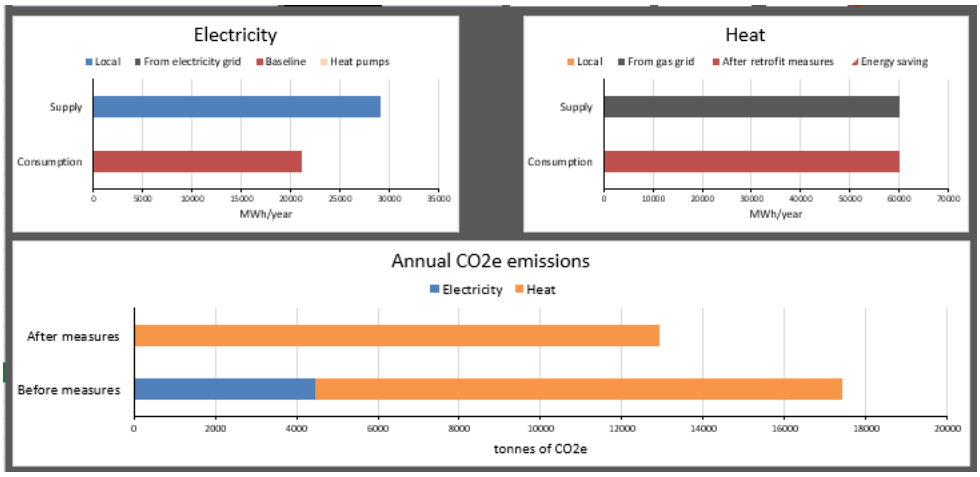
The group concluded that given the size of the parish and the potential sites available there was capacity for all five of the nominal number proposed for this technology. There was clear preference for the large wind turbines – the bigger the better was suggested.

We said that turbines could be placed on higher ground but recognised that some of those areas are environmentally sensitive. They also noted that several nearby

settlements might benefit from turbines in those higher locations, and that if only five—or just a small number of large turbines—were needed, it might still be workable.

The discussion focused on the A3 corridor which was thought to be more publicly acceptable. While the group itself was supportive of wind turbines, they acknowledged that not everyone shares that view. Because the A3 is not considered a particularly scenic route, they felt it would attract less opposition. They also pointed out that the A3 location would be easier to access for maintenance and operational needs.

Using the CESAR tool the workshop demonstrated that 5 x large wind turbines would generate more that Bramshott and Liphook's annual electricity requirements. This would wipe out all the associated carbon emission.



Impact of 5 x Large (140m height to blade tip) Wind Turbine on local electricity supply

The wider group shared their responses to this table's suggestion and discussed the following points:

- Some people in the wider group questioned whether placing turbines along the prominent A3 route would mean that everyone travelling through the parish would see them, increasing the perceived visual impact.
- There was a conversation comparing the output of five large turbines with that of several smaller wind farms. Large turbines are highly productive, generating significant electricity from a relatively small land area, though with greater visual impact. Smaller turbines, by contrast, produce far less—sometimes under 25% of the output of a large turbine—while still requiring land and infrastructure. This is due to the logarithmic relationship between height and energy generation – you get more than double the energy when doubling the height of the turbine.
- When asked for views on the idea of concentrating turbines in one location, some participants said they would prefer a single, clearly defined cluster rather than turbines scattered across the wider landscape. This, they felt, would limit the number of viewpoints from which turbines would be visible. Others agreed that a designated area might be the most acceptable option, though identifying

such an area would be difficult given the parish's conservation status and valued landscapes.

- Several people suggested that placing turbines on hills might work if they were positioned so that they were not visible from key viewpoints. Hills often offer long-distance views, and careful siting might reduce the visual impact. However, the group acknowledged that this was a complex judgement and that no obvious location stood out as an easy choice.
- There were questions about ownership and energy distribution. Turbines and other large scale renewable technologies need to be sited near to where the electricity will be used otherwise it goes directly to the grid. This increases the wider availability of renewable energy.
- Energy Local https://energylocal.org.uk/ is a national organisation that links relatively small generators to provide cheaper electricity for people in an area, but it only works for quite small-scale generation.
- There has been a campaign for the last three or four years for the Local Electricity Bill https://bills.parliament.uk/bills/3039 which would allow a link between local generation and local use. It has been resisted by this government despite cross-party support. Commercial generators have a lot of lobbying power.
- Local generation can still benefit local communities through community benefit funds set up alongside local energy generation. For example, through community ownership of the generation that receives money back on shares. This is how Energise South Downs large solar rooftop projects work https://esd.energy/share-offer-2025/. A good example of a community benefiting from 100% community owned onshore wind is Lawrence Weston Turbine near Bristol. https://ambitioncommunityenergy.org/
- Wind turbines do cause some bird deaths, but there are things you can do to limit that damage — for example, careful siting, or painting some of the blades black. Currently, around 100,000 to 200,000 birds a year are killed by wind turbines in the UK. To give a sense of scale 40 million birds are killed every year in the UK by domestic cats.
- There was discussion on the wind power table about concerns for decommissioning of wind turbines as many in the UK are reaching their end of life. This was not discussed with the wider group – but here is some more information https://cleanenergybusinesscouncil.com/wind-energy-glossary/wind-turbine-decommissioning-and-recycling/

Domestic Solar

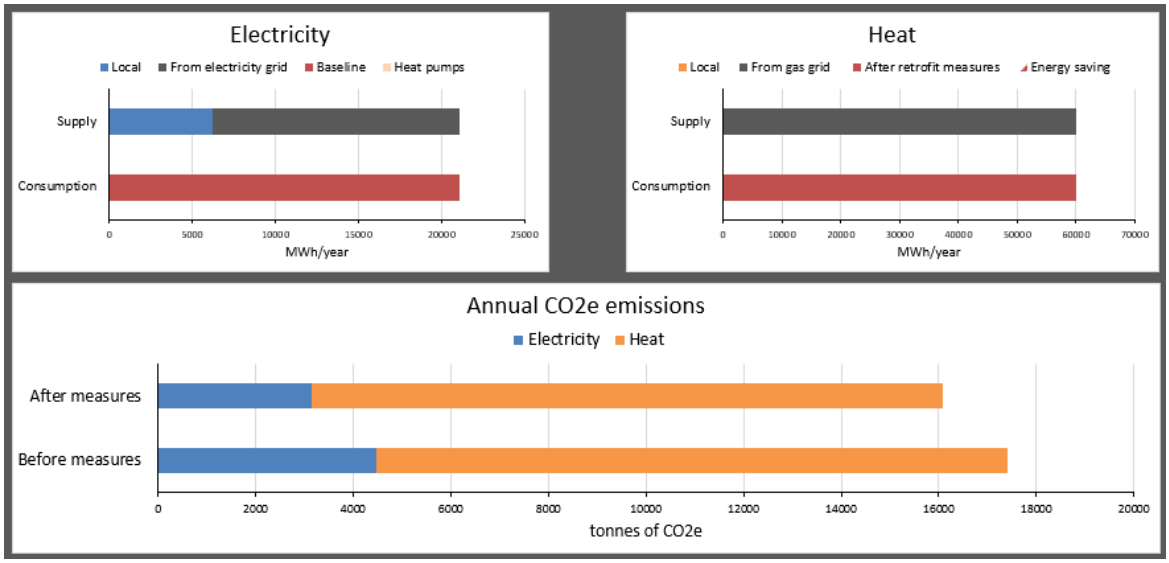
The third group felt very positive about domestic solar power overall, rating it five out of five in terms of acceptability and describing it as a sensible and beneficial technology.

They agreed it is an important part of future energy generation and widely acceptable in principle. However, there were concerns about the visual impact of panels, noting that

they can look unattractive on some buildings. While solar tiles blend in better, the group felt that their cost—around three times higher—made them unrealistic for most households.

The nominal maximum amount of domestic solar panels was set at 75% of Bramshott and Liphook homes having 10-12 panels. However, the group suggesting that 30–40% was more realistic given issues such as home ownership, roof suitability, and aesthetics.

The workshop demonstrated that the introduction of 40% of Bramshott and Liphook homes with 10-12 solar panels, the electricity demand from the grid would be reduced by about one third. See the Electricity Graph below. This was considered a meaningful amount that would reduce the need for other forms of energy generation, such as large ground mounted solar farms.



Impact of 40% of local homes having 10-12 solar panels

The wider group shared their responses to this table's suggestion and discussed the following points:

- Modern photovoltaic solar panels are far more efficient than older models, with some now producing around 550 watts per panel. They typically last around 25 years and come with performance guarantees that ensure they still generate around 80–90% of their original output at the end of their lifespan. Panels work best when angled correctly and kept cool. They can still generate useful electricity on east and west facing roofsor even using ambient light on north-facing roofs.
- The government's newly announced Warm Homes Plan https://www.gov.uk/government/publications/warm-homes-plan which includes zero interest loans for solar installations, potentially improving affordability and reducing payback times.There was strong feeling that all new build homes should automatically include solar panels and heat pumps, and they welcomed news that legislation requiring this is expected soon, with new standards applying from 2027.

- The group also discussed practical issues such as installing panels on flat roofs, using in-roof systems, and the possibility of ground mounted panels in small gardens. They acknowledged that while visual impact is a concern, solar technology has improved significantly, making installations more efficient and more flexible than in the past.

Heat pumps

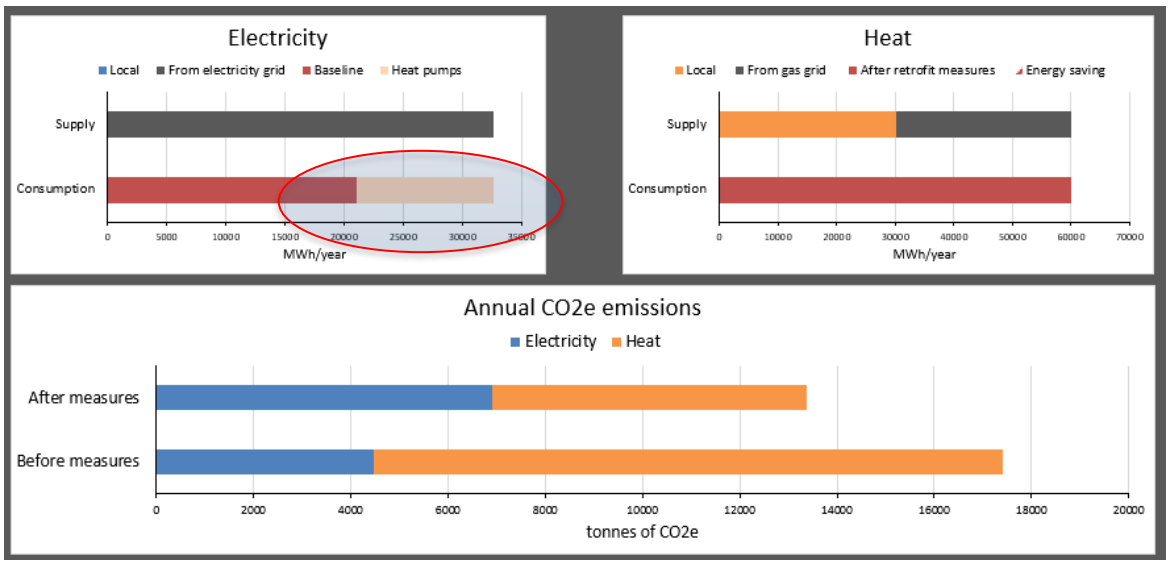
The final group looked at heat pumps and rated them a high four to five out of five on acceptability. Many of the group are already familiar with the technology, and some have heat pumps installed in their own homes.

They felt the visual impact was generally minimal, though it was noted that they are attractive units (??) when placed on the front of properties, especially in conservation areas where installation rules may be stricter.

The discussion considered a scenario where a notional maximum of 75% of homes in the area could technically have an air-source heat pump, with around 10% suitable for ground-source systems. The group felt that, in practice, around 50% of existing homes could adopt heat pumps when their boilers reach the end of life, especially if supported by financial incentives such as the Warm Homes Plan https://www.gov.uk/government/publications/warm-homes-plan .

With new housing developments expected locally, they believed 100% of new-build homes should include heat pumps from the outset. Taken together, this suggested a realistic overall target of around 60% of homes using heat pumps.

The Heat graph below shows that 60% of homes with a heat pump reduces the gas demand from the grid by half. Heat pumps do increase the electricity use (see the pale pink area, circled in red on the electricity graphs). However, as they are highly efficient (generating around three units of heat per unit of electricity used, this significantly reduces the overall energy consumption and cuts carbon emissions from heating. Heat pumps are central to the shift away from gas heating.



Impact of 60% of local homes having a heat pump

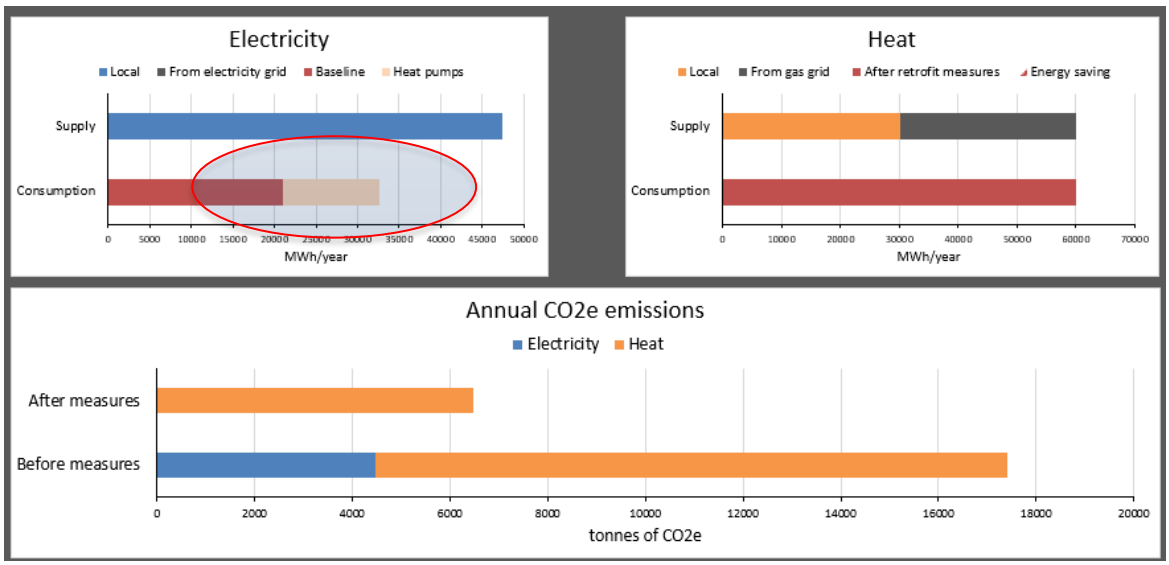
The wider group shared their responses and discussed the following points:

- Heat pumps are low carbon heating systems that extract heat from the air or the ground and transfer it into a home. They use electricity to "magnify" or concentrate that heat to warm the home. Heat pumps are far more efficient than fossil fuel boilers, producing 3 times the heat for the same amount of energy used. This results in much lower carbon emissions.
- Modern heat pumps can work effectively in a wide range of homes, including older or less well insulated buildings, as long as the system is properly designed for that property.
- Some participants were interested in pairing heat pumps with home batteries to take advantage of off--peak electricity tariffs or solar generation. It was noted that calculating the running cost of a heat pump is highly individual, depending on home size, insulation, and system design. There was interest in receiving personalised home energy- advice to understand these factors better.
- The group also discussed the challenge of predicting future electricity tariffs, which makes long term- planning difficult. Nonetheless, they recognised that heat pumps, combined with smart tariffs and solar power, could offer substantial savings and environmental benefits.

Technologies in combination

None of the individual technologies hold the complete answer so the CESAR tool was used to see what might be generated if we were to combine the technologies.

For this we input into the CESAR tool the number of technologies suggested by each group that were acceptable in the local area to see what the impact would be on supply and demand.



Bramshott & Liphook Future Energy Landscape

The above chart represents the combination of the maximum technologies discussed at the workshop.

- 5 x large wind turbines
- 5 x 6 acre solar farms
- 40% of homes with 10-12 solar panels
- 60% of homes with heat pumps

As the figures were entered, the model showed that electricity demand would rise because of the heat pumps, but overall generation would still exceed consumption. In fact, the community would generate around 25% more electricity than it used. Carbon emissions would fall to less than half of current levels, although some emissions would remain from homes still using fossil fuel- heating.

Retrofitting

Making homes more efficient—especially by cutting heat loss—means far less energy is needed to keep them warm, which in turn reduces electricity demand when switching to electric heating. Retrofitting varies in difficulty: some homes are simple to improve, while others require more complex work.

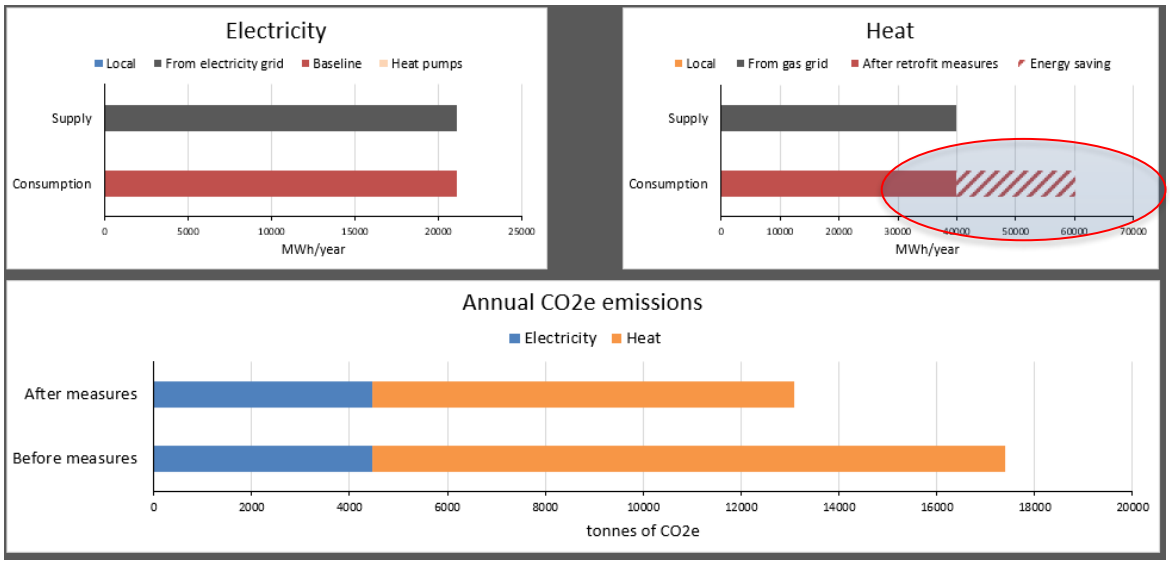
We outlined three broad home types

- Older pre-1930 houses, built with solid walls and natural ventilation, are draughty and harder to upgrade, though improvements are still possible. Around a quarter of parish homes fall into this group.
- Homes built between 1930 and 1990—have cavity walls but were constructed before modern insulation standards. Many have some insulation, but often not enough, and there is still significant potential to improve their efficiency. About half of local homes are in this category.

- Modern homes built after 1990, which follow strict insulation rules and often need very little heating at all. For example, new flats in Bordon where residents use heating for only two weeks in January because the buildings retained heat so effectively.

The CESAR tool allows us to demonstrate the impact of retrofitting in Bramshott and Liphook. The below heat graph, with the dashed red bar (highlighted with a circle), demonstrates that-retrofitting could cut heat demand by more than a third. This would reduce carbon emissions and lower the amount of energy needed for heating.

Participants were encouraged to explore the government's https://www.gov.uk/government/publications/warm-homes-plan and seek personalised advice, as many retrofit measures—like loft insulation, draught-proofing, and cavity wall insulation—are inexpensive and offer quick payback, while also improving comfort.



Impact on the heat demand following a local retrofit programme

Conclusion and recommendations:

It was a great to have the local people of Bramshott & Liphook come together to share their thoughts about different renewable energy technologies and also learn from each other about how the different technologies work and what could be acceptable where they live.

This was a hypothetical conversation where we put to one side constraints such as planning, cost and grid capacity. These are very real practicalities, particularly in the South Downs National Park and would have to be considered to initiate a future community energy project.

The idea is to provoke local awareness and spark ideas about how we can all play our part in the energy transition. Here are a few suggestions from the workshop that the local community might take forward:

- Share this report and Bramshott & Liphook community survey more widely so that as many people in the local community can share their thoughts.
- Explore the government's https://www.gov.uk/government/publications/warm-homes-plan and seek personalised advice, as many retrofit measures—like loft insulation, draught-proofing, and cavity wall insulation—are inexpensive and offer quick payback, while also improving comfort.
- Support and champion the Local Electricity Bill by following Power for People.
- Mobilise local people to put pressure on the local authority to demand and enforce higher standards from developers building the new affordable housing in Bramshott and Liphook complying with the neighbourhood development plan https://www.easthants.gov.uk/planning-services/planning-policy/neighbourhood-planning/bramshott-and-liphook-neighbourhood-plan

There is no simple solution, but this workshop format demonstrates how people learning together in their local context can shape local action. Sometimes these community conversations open local possibilities about generation projects, but they also highlight what is critical and needs to be done at a national level through policy to help us all transition away from fossil fuels.

Appendix 1 - Tools, assumptions and research

Tools

Future Energy Landscapes: toolkit here

CESAR (Community Energy Saving Renewables) workbook: Showing renewable energy generation in relation to how much energy the community uses and the impact of renewables on carbon emission reduction.

Impact Tool: An estimator of a community's carbon footprint that works for parishes, wards, district councils and unitary authorities here.

Assumptions

Onshore wind and solar farms
Assessments of suitability of landscape for different technologies represent an upper bound estimate and do not take full account of the impacts associated with potentially limiting characteristics (proximity of roads, railways land type etc.) (LUC, 2018). Spacing of wind turbines is based on an allowance of five times the rotor diameter (LUC, 2018).

Rooftop PV
Suitable rooftop is defined as one on which a minimum of a 1 kW solar PV system can be installed (8 m2 rooftop area required), with an orientation east through south to west and at an angle between 15° to 70° (Palmer et al., 2018).
Analysis suggests that in the City of Southampton district 67% of rooftops had one area that satisfied the criteria (Ridett and Anderson (2023), p19), while in the wider Winchester City area 78.8% had a rooftop surface that was deemed as suitable for a rooftop PV installation of at least 1 kW (Ridett and Anderson (2023), p20).
These figures are likely to represent an upper bound estimate of solar PV potential. For the purpose of the CESAR tool, an estimated potential of 75% suitability would provide a realistic upper bound estimate.

ASHP/GSHP
Based on assumption that dwellings need to be reasonably airtight and well insulated. Significant proportion of post 1990 houses plus an allowance for others that might have had deep retrofit we assumed 50% of homes could have an ASHP. We then considered that older homes in the centre of the towns / villages would have bigger gardens so assumed 25% would have room for GSHP.

Research

https://eprints.soton.ac.uk/490388/1/UoS-HCC-2023-WP1-Updated-Renewable-Electricity-Potential-Hampshire_v2.0_clean.pdf

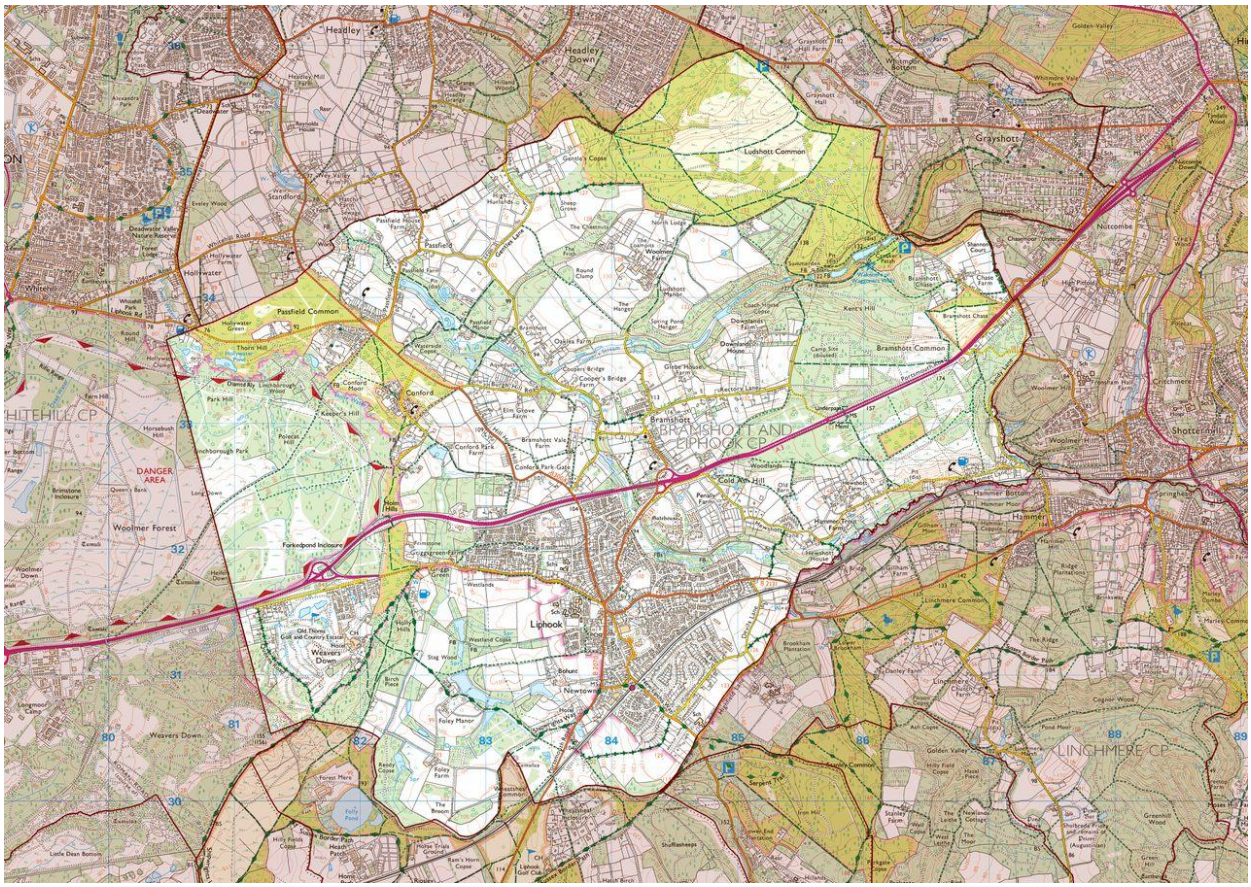
https://www.easthants.gov.uk/media/5147/download?inline

https://petersfieldcan.org/media/lnzn04sp/desnez-east-hants-district-emissions-final-07-sep-2023.pdf

Energy South2East – towards a low carbon economy LOCAL ENERGY STRATEGY

Palmer D., Koumpli E., Cole I., Gottschalg R. and Betts T. (2018). A GIS-based method for identification of wide area rooftop suitability for minimum size PV systems using LiDAR data and photogrammetry. Energies, 11(12): 3506

UK Government (2023) Figures for English Housing Survey headline report 2022 to 2023.


Headley
Headley Down
Grayshott
Ludshott Common
Passfield
Passfield Common
Hollywater
Bramshott Common
Bramshott
BRAMSHOTT AND LIPHOOK CP
Liphook
Woolmer Forest
Weavers Down
Forkenpond Inclosure
Cold Ash Hill
Hammer
Shottermill
LINCHMERE CP
DANGER AREA