

Learnings from Green Deal Communities

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Background

The Centre for Sustainable Energy (CSE) and National Energy Foundation (NEF) are both independent national charities acting to share knowledge, experience and expertise to help others to better understand energy use, to support energy efficiency and renewable energy projects and to help alleviate fuel poverty.

Green Deal Communities funding was launched in July 2013 when Greg Barker, Minister of State at the Department of Energy and Climate Change (DECC), announced a pot of £20m to support a street-by-street approach to promoting the Green Deal.

“A new £20m Green Deal Communities scheme to help local authorities drive street-by-street delivery of the Green Deal has been announced today. Under new proposals from the Department of Energy and Climate Change (DECC), local authorities in England will be able to bid for funding from a £20m pot to help households benefit from the Green Deal on a street-by-street or area basis”.¹

That pot was soon increased to £88m and in April 2014 the government named the 24 local authorities that would be supported under the Green Deal Communities scheme (see box).

In the majority of cases, the local authority being funded involved other administrations – district and borough councils for example – in the project, so the total number of local authorities that benefitted from the programme was over 100.

The project was initially designed to last for just one year, but was extended a number of times for some projects and eventually closed in October 2016.

During the delivery of the project, local authorities were able to share experiences on the online collaboration too, Huddle, but there was widespread disappointment that no fuller evaluations or events to share learning had been planned, especially as many of the schemes had encountered problems. The majority of local authorities who were involved in the scheme felt that learning from the delivery of Green Deal Communities could be valuable in shaping the design and management of future projects.

The 24 local authorities supported under Green Deal Communities

East Hampshire District Council: £2,944,668

Dartford Borough Council: £4,026,855

Leeds City Council: £4,943,200

Bristol City Council: £7,292,200

Nottingham City Council: £5,473,300

Broadland District Council (South Norfolk & Norwich City Council): £1,444,300

London Borough of Hillingdon: £2,975,900

Telford & Wrekin Council: £4,859,900

Worcestershire County Council: £3,630,100

London Borough of Lewisham: £1,656,222

Surrey Coalition (Woking Borough Council): £2,550,491

Plymouth City Council: £3,068,800

South Buckinghamshire District Council: £2,574,991

Manchester (Oldham Metropolitan Borough Council): £6,119,700

Ashfield District Council: £1,097,098

Suffolk County Council: £5,712,600

Cambridge City Council (Cambridgeshire wide consortium): £7,857,400

Peterborough City Council: £3,945,100

London Borough of Haringey: £6,560,012

Bracknell Forest Council: £1,820,714

Eastleigh Borough Council: £3,336,900

Nuneaton & Bedworth Borough Council: £2,084,502

London Borough of Harrow: £1,457,100

Bath & North East Somerset Council: £929,300

Process

CSE and NEF were both actively involved in Green Deal Communities. CSE delivered energy advice for Bath and North East Somerset Council while NEF managed the South Bucks Consortium project.

Following the closure of Green Deal Communities we decided to hold a independent 'learnings event' in order for the lessons learnt from the scheme to be recorded and disseminated. This is in line with both organisations' missions which include the sharing of knowledge and experience.

With assistance from the Department for Business, Energy and Industrial Strategy (BEIS) this event took place on 11 January 2017 and was attended by representatives of 19 local authorities, a number of delivery partners, Ofgem and BEIS.

The learnings event was structured around three specific sessions.

- The first session focused on the biggest challenges, including discussions around topics such as programme design, interactions with BEIS, changes to national policy and managing procurement rules.
- The second session looked specifically at problems which had been encountered and the solutions which different local authorities had developed. With individual groups focusing their discussions on programme setup, planning and procurement, customer engagement and measures delivery.
- The final session looked at solid wall insulation and how future projects could be designed in a world with little or no subsidy. Again, groups focused on discussions around specific topics. These included marketing, finance models and local supply chains.

Discussions and views were recorded on the day, and a draft report was made available to all attendees and others unable to attend to capture further feedback and views.

The findings have been split into two parts: 'recommendations' that were supported unanimously or by the majority of stakeholders, and 'suggestions' which were put forward by a number of stakeholders but either did not have unanimous backing or were not discussed widely.

Please note in July 2016 DECC merged with BIS to become the department of Business Energy and Industrial Strategy. We have used BEIS in the remainder of this document to represent the department.

Recommendations

Recommendations (A): Programme design

Recommendation 1: Provide well planned project evaluation

Project evaluation needs to be clear and planned from the outset. This helps delivery as partners understand the indicators for success and the documentation required to evidence them. A clear understanding of the whole evaluation process enables good planning of both time and resources.

No surprises here. We need, and expect, good evaluation of projects. The experience of those involved in on-the-ground delivery who have worked with a range of contractors and householders should not be under-estimated. Policy consultation exercises and independent reviews are often dominated by the same individuals from large managing agents, energy suppliers and not-for-profit organisations. Whilst they may be well-meaning and committed to developing the best policy possible, they are likely to be removed from the actual installation process and therefore not focused on issues that result in the best outcome for the householder.

Green Deal Communities received £88m of funding and there has been no active evaluation or recording of results and lessons from these myriad projects. In contrast, the Local Energy Action Fund (LEAF), which distributed just £9.3m, was independently evaluated and made recommendations for future delivery. It is not clear whether any of the findings from the LEAF evaluation fed into the design of Green Deal Communities, which in itself had a limited evaluation plan that changed during the lifetime of the project.

Recommendation 2: Agree clear objectives at the outset

State clear objectives at the outset of any future energy efficiency programme. If the programme seeks to test a variety of approaches then make this clear and do not attempt to directly compare projects using different approaches during the delivery phase.

This recommendation is linked to the one above. The success of a project cannot be reasonably evaluated if there are no clear objectives. Partners were originally asked to set their own evaluation criteria. These were approved by BEIS and formed the basis of the interim evaluation reports. However, when the final evaluation reports were requested by BEIS different evaluation criteria were being used. In some cases, these built on what had been included in the interim evaluations; in others, they did not.

Many partners, therefore, believe the objectives were unclear at the start and changed during the project lifetime. Some felt the project was designed to support the Green Deal, others that its focus was on developing a supply chain, while others still insisted that the main focus was the street-by-street approach. Whilst all these might have been relevant, the objectives were certainly not clearly communicated to the partners, and their importance changed over time as strategic thinking in BEIS altered.

Recommendation 3: Lengthen project timescales

Ensure project timescales are appropriate to the relevant technology and take into account the maturity of the supply chains.

In designing future schemes, it is imperative that BEIS listens to partners and bodies who have actual experience of delivery. BEIS should ask relevant questions of people with experience of installing the promoted

measures or technologies, e.g. what timescales are realistic and what seasonal challenges should be considered. Realistic timescales need to take a technology's maturity into account as well as the actual time required for the installation. Solid wall insulation is not a well-known measure and engagement and education is needed prior to the householder's decision to proceed. This takes time and needs to be factored into the scheme design process.

NB: the evaluation of LEAF funding² also cited short timescales as a reason for under delivery:

"Those who achieved less than planned (around 15% of participants) reported not meeting expectations on deliverables, such as numbers of surveys conducted. This was mainly reported to be due to lack of time to prepare or promote the activities and (consequently) attracting less public interest than hoped." (p8)

"Timescales were spontaneously reported to have affected successful delivery by 76% of respondents and of these 98% reported the effect to be negative." (p17)

"It would have been good to take more time to plan the communications campaign and to develop the right messages to stimulate interest in the energy surveys." (p18)

Recommendation 4: Be realistic about both timing and timelines for delivery

Ensure projects are timed so that installation works can be planned when the weather is appropriate. This is particularly relevant to solid wall insulation.

GDC funding was awarded in the spring. In many cases marketing started almost immediately, in others it was delayed due to procurement and other issues. This meant that delivery often began as winter approached, a poor time to install solid wall insulation as working days are lost due to bad weather and renders need to be completely dry before subsequent layers are installed.

Recommendation 5: Increase Project Management Funding

Project management costs need to reflect the (im)maturity of the promoted technology and the length of the project.

Many partners commented on the lack of funding for project management. The proportion of the overall Green Deal Communities grants allocated for project management was 10% - more or less the norm for government funding but clearly insufficient in this instance. This was further compounded by time extensions, which were granted without the allocation of additional funding.

Non-capital expenditure on this project was always going to be high as solid wall insulation was not widely understood. In addition, the funding mechanism was novel and unknown to consumers and the majority of the installers were new to the market. In particular, ensuring that the quality of work was sufficient to both protect the property from adverse damage and guarantee the lifetime of the product, added to the project management cost.

Partners did appreciate that BEIS was operating in an environment of financial austerity, but believed that projects would have been more successful if they had had lower target numbers, a clearer focus on quality and enough cash for the following:

- Comprehensive marketing and promotion.
- Excellent customer advice services.
- Extensive development of the solid wall insulation supply chain.

Recommendation 6: Consider a phased approach

Provide funding in a phased manner which takes account of timings, timescales and potential delivery.

Partners clearly identified several key phases to the delivery of their projects, typically:

- Set-up and procurement.
- 'Warming-up' the area and developing the supply chain.
- Delivery.
- Completion.

Councils that had delivered solid wall insulation previously could sometimes speed up the procurement and supply-chain development phases. Those that had experience in CERT or CESP projects or had been the subject of Pioneer Places activity found marketing of the scheme simpler if householders in the area had already seen solid wall insulation in-situ or could be offered the opportunity to do so relatively quickly.

A natural conclusion of this finding, coupled with some of the above recommendations, is that a phased approach might have been more appropriate to both funding and project development. The government's heat networks delivery funding (HNDU) was cited as a good example where this appeared to work well.

A future project could consider different timescales for different phases, for example:

- Data gathering and feasibility (including engagement with local planning teams).
- Procurement.
- Marketing.
- Delivery.

Funding could even be separated by phase with an early round being used to assess a larger pool of applications e.g. a large number of projects might receive funding for data gathering and feasibility with a smaller number of projects eventually being fully-funded. This would enable funding to be focussed on those projects which could demonstrate the highest customer interest. Funded projects would then need to be supported throughout the remaining phases of delivery. The release of this funding could be phased but shouldn't then be dependent upon performance as this might be detrimental to delivery and partnership development.

Recommendation 7: Provide advance guidance

Provide clear guidance on procurement and make sure rules are applied consistently (see below).

BEIS should consider what advice partners are likely to require to enable them to progress the project successfully and, where possible, BEIS should try to provide some of this from the outset. For GDC, issues around procurement were common as were those around the implications of state aid. Many partners sought legal advice and incurred additional time and costs. Outline guidance in these respects could have saved duplication of effort and cost.

Another common issue was a difference in the understanding of what was designated as capital expenditure and what was revenue. Some partners considered that enabling works (such as assessments) were capital expenditure, others did not. Guidance on this at the outset could have saved both time and concern by the partners. Indeed, in some cases it may have released additional funding for project management.

Recommendation 8: Be consistent

Ensure programme managers at BEIS apply and adapt rules consistently across funded projects.

One aspect that partners considered 'unfair' was a lack of consistency on the level of grants available to householders across different projects. In some cases, the grant on offer was lower than that available through the Green Deal Home Improvement Fund (GDHIF).

That said, partners do appreciate that different areas face different challenges. Rural districts, for example, might find it more difficult to find solid wall insulation installers and may need to pay more for their services. Smaller properties might cost less to insulate, so an area with a higher proportion of these may require a smaller grant. London, by contrast, was cited as an area with substantially higher costs.

Overall, however, there appeared to be no rationale behind the varying level of grant. This was compounded by a lack of communication from BEIS, with some partners finding out about differences in grant levels in other GDC areas from their installers. These installers persistently lobbied for BEIS to increase the grant available in their area.

That there were also differences in the limit of allowable customer contributions, with some being a minimum of 30%, others 25% and others still 10%. Some partners were required to first calculate the potential Green Deal Plan amount to calculate a customer contribution. Also, customer contributions changed during the project, with different BEIS project managers happy to allow different levels of contribution. This was particularly the case for fuel poor households which became more important to BEIS following ministerial changes.

Whilst the changing policy landscape required account managers to adapt the rules for GDC projects, this should have been done in a consistent and fair way. However, BEIS's readiness to discuss issues and make changes was welcomed and would be encouraged going forward in subsequent schemes.

Recommendations (B): Householder engagement

Recommendation 9: Use trusted expert messengers

Solid wall programmes need to be accompanied by competent local advice provision.

Householders need to understand the benefits of solid wall insulation in order to make the decision to install; they also need to understand the installation *process* to ensure that they get a product and service they are happy with.

Solid wall insulation cannot be classed as market-ready for one-off installations in the private housing sector; the supply chain is still developing, and people's awareness of the measure is low. Householders who did go on to install solid wall insulation through GDC often required detailed advice covering the technical aspects of the installation. They valued the impartial advice that many local authorities provided, either directly or through their partner agencies (NB this does not refer to the installer).

Whilst a single quality mark for energy efficiency measures, as recommended by the Bonfield Review, will increase consumer confidence and awareness, there is still a need for the provision of *local* local authority-endorsed advice.

Recommendation 10: Demonstrations should be an integral part of large-scale solid-wall insulation projects

People are more likely to invest in energy efficiency measures if they are able to see them in-situ, and they can talk to either an impartial advisor or a householder who has already installed them.

The availability of demonstration properties was highlighted many times as a factor in the success of projects³. This might involve the creation of show homes, but these need to be undertaken well in advance of project delivery. In most cases, additional funding was made available to include show homes, but many were either not completed in time to be of real benefit to the projects or were abandoned (often due to planning issues). Had the timescales been different at the outset this might not have been the case.

Several projects used open-home events to showcase solid wall insulation and other energy efficiency measures in the local area. Future programmes might want to prioritise areas where previous projects have installed solid wall insulation, perhaps funded by housing associations via CESP or ECO, as these can act as demonstrators and will have raised awareness of solid wall insulation in the local community.

Recommendation 11: Take a staged approach to marketing

Marketing needs to be appropriate to the maturity of the project and the area to be targeted.

This links to Recommendation 6 above (taking a phased approach to project support and delivery). GDC projects felt door-knocking played an important early role in recruiting householders to the scheme (though, of course, a good offer is still key to take-up irrespective of the marketing route). However, once the first installations had been completed or the show home was in place, word of mouth became the best marketing tool. Indeed, several schemes used this tactic to seed areas and generate demand locally, for example by offering discounted prices for early adopters.

Recommendation 12: Provide a customer focused service

Put the customer at the heart of the project, not the installer or the targets.

The solid wall supply chain isn't yet providing a customer-focused service. Installers, for example, are more used to dealing with managing agents than with householders themselves. Schemes need to offer householders – the customer – a full-spectrum service similar to their experience of purchasing major items, such as kitchens and bathrooms at a retail outlet or online. Here, they expect a service that allows them to customise the end product to their needs and tastes, along with clear timeframes and terms and a relatively straight-forward offer of finance. They would also expect the installer who carries out the works to view them, the householder, as the client, rather than the retail outfit through which the works were ordered.

Solid wall insulation is expensive and, as such, the customer will expect all of the above and more. To encourage wider take-up at lower rates of subsidy, schemes need to market the wider aesthetic and comfort benefits – e.g. that the house will look good and keep the occupants warm.

Recommendations (C): Supply chain

Recommendation 13: Procurement and quality assurance

The current accreditation framework and the level of knowledge in the supply chain are not robust enough to ensure that the work undertaken is of good quality. Quality assurance requires a clerk of works or similar professional oversight to ensure that standards are raised and maintained.

The quality of installed work and the necessary quality assurance was an issue for the majority of schemes. Early installations often suffered from snagging issues, especially around detailing, which resulted in delays in the sign-off process and considerable householder dissatisfaction. Installers either lacked experience of solid wall insulation or their experience had been gained through working on the more uniform properties of social housing schemes. In both cases this undermined the quality of their work and meant that the installation process wasn't customer-focused.

A few projects employed a clerk of works to oversee the quality of installations and to sign-off the finished work. This was effective in ensuring quality assurance, reducing snagging issues and providing the householder with confidence. But most didn't, and as a consequence many poor installations were signed off by householders who were not in a position to judge whether the solid-wall insulation on their home was of an acceptable quality.

Several schemes are still (at the time of writing, March 2017) facing issues with unfinished installations that are yet to receive a guarantee from the Solid Wall Insulation Guarantee Agency. Schemes did raise the possibility of including penalty clauses in installers' contracts but they felt that this would increase the delivery cost.

Recommendation 14: Procure quality as well as value for money

Consumer confidence requires success stories rather than local press stories highlighting problems. Schemes should place the quality of the installed works at the centre of the application process, for example by tendering for zero defects not cheap prices.

Many of the projects expressed concerns over the tensions between installation cost and quality. They felt that the overall GDC procurement process was dominated by delivery cost and value for money at the expense of quality. If future programmes focus on cost, there is an incentive to commission cheaper (and potentially lower quality) materials and suppliers. This approach will also continue to favour certain areas where works are cheaper, and places such as London with higher labour and operating costs will find it harder to access funding.

Suggestions

The following suggestions were also made but were either not unanimously supported or were not discussed more widely at the event.

Suggestions (A): Programme design

Suggestion 1: Develop supply chain skills

There should be a comprehensive solid wall insulation course which is mandatory for all installers. This should cover the key aspects of detailing, materials and moisture transfer. Installers using individual systems should then complete a short system-specific course.

The quality of installations proved to be challenging for many of the schemes, particularly at the beginning of the installation process. Currently, installers need to be Green Deal Installers to access ECO funding; this will also mean that they're PAS-2030 accredited. Typically, projects that employed a larger contractor found that the work was sub-contracted to smaller installers who didn't necessarily have the same level of accreditation. However, following a relatively short course on the solid wall system to be applied, the subcontractors were able to deliver works under the main contractor's accreditation framework.

The quality sign-off process could be dramatically improved for solid wall insulation. If local authority building control teams and scheme managers were using a common sign-off process which could be made freely available, this would complement any training courses that aim to ensure a common standard of delivery.

Suggestion 2: Create a project board

To ensure future projects are supported by others with relevant experience, BEIS should create a project board for all large funding streams.

BEIS should form a project board of stakeholders who have worked on similar projects, and use this to help design the project. The board could involve policy makers from other government departments, such as the Department for Communities and Local Government (DCLG), who could issue useful guidance on non-BEIS related policy matters e.g. guidance to local authority planning teams on the local interpretation of planning law. This approach was particularly effective when used to provide the Local Energy Assessment Fund. The LEAF board was made up of individuals and organisations, all of whom had previously been involved in the practicalities of delivery.

In addition to helping to design the scheme and to provide guidance, the board could potentially score applications, ensure consistency across the projects and help to develop the necessary documentation.

Suggestion 3: Provide template documents

Future programmes should provide best practice examples of documentation used in delivery. These could be adapted where necessary.

The majority of schemes developed a suite of documents to support grant payments: tender documents to procure a Green Deal Provider; a supplier contract; customer and installer terms and conditions; customer satisfaction sign off sheets. Given that most of the schemes were broadly similar, it would have been helpful and time-saving if adaptable templates had been developed in advance to be used by all.

Suggestions (B): Policy

Participants at the review event also explored the potential for solid wall insulation in a no-cost or low-cost subsidy context. Several recommendations focused on high level government policy and these are summarised below.

Suggestion 4: Encourage energy efficiency at point of sale

Introduce variable stamp duty rates that take into account energy efficiency and Energy Performance Certificates (EPCs) at the point of sale.

Several studies^{4,5} have shown that varying stamp duty rates based on the EPC band of the property would provide the necessary economic incentive to invest in energy efficiency whilst being revenue neutral to the treasury. BEIS needs to work with DCLG to link property value and efficiency; this would raise the profile of the EPC in the sale process and provide some impetus for deeper whole-house retrofit.

Suggestion 5: Draw up a long-term plan to develop the supply chain for solid wall insulation

BEIS should publish its long-term strategy for the deployment of solid wall insulation. This should be timed to end with the fifth carbon budget i.e. in 2032.

Stakeholders found the discussions around supply chain development and the potential for local contractors difficult. There was an overwhelming sense that the industry needs a policy framework which sets out the government's long-term plan and encourages investment, stimulates training and improves quality. However, this will clearly need some investment or regulation.

Several partners commented on the 'importing' of contractors and labour from other parts of the UK or from other EU member states. By not using local suppliers are we failing build the skill-base required to make the changes to our housing stock sufficient to meet the UK's carbon targets?

Suggestion 6: Develop better financing options

The Green Deal didn't solve the finance issue for solid wall insulation. There is still a need to provide low-cost finance for solid wall insulation and other energy efficiency measures.

There were numerous suggestions by partners for alternative financing models. These included credit unions managing revolving loan funds, green mortgages, repayments tied to the land registry, energy performance contracts, and a better pay-as-you save loan.

The need to achieve the savings (as per the 'golden rule') was an interesting point for conversation. Many partners felt that householders might be willing to pay for measures even when the savings are not sufficient to cover the outlay if they saw other benefits accruing from the purchase.

In addition, anecdotal evidence suggests that many, if not most, people don't believe that the projected savings will ever be realised anyway, which means that making this the focus of your sales pitch detracts from the wider benefits of solid-wall insulation such a warm and healthy living environment and a well maintained house.

Suggestions (c): Private rented sector

Bristol City Council was unable to attend the learning session, but ran a specific pilot project for the private rented sector and as such has provided some valuable feedback as an addendum.

Suggestion 7: Engaging landlords

Schemes targeting the private rented sector need to consider how they work with smaller contractors who might sit outside the ECO framework for delivery e.g. PAS 2030.

Bristol's experience was that the private rented sector was a difficult sector to engage with. The council had hoped to work with landlords on a portfolio of multiple properties but the offer wasn't attractive to them. This is because large private sector landlords tend to work with their own contractors or service management companies at agreed rates - e.g. for central heating systems - which are often lower than those offered by the council scheme, even allowing for funding. This is in part because their own contractors can complete the works quicker as there is a shorter customer journey and less paperwork.

Suggestion 8: Operationalising EPCs

The original housing health and safety rating system (HHSRS) guidance contained a SAP threshold of 35. Subsequent guidance from the Chartered Institute of Environmental Health⁶ challenged this and, as such, no proxy is available. This should be clarified.

EPCs were central to engaging the private rented sector due to the forthcoming minimum energy efficiency standards (MEES) legislation. This means that, from April 2018, both private domestic and non-domestic landlords must ensure that the properties they rent out achieve at least an EPC rating of E before granting a tenancy to new or existing tenants. It should be noted that the ending of the Green Deal has cast doubt on how this legislation will be enforced. The administration of the scheme and the use of EPCs as a targeting tool was challenging due to inconsistencies in their production and a huge degree of variability in the results. Bristol council had hoped to work with their private sector housing team to use EPCs in conjunction with a HHSRS assessment. However, differences in their methodology and approach to classifying cold made this difficult. Simpler criteria are needed.

Houses in multiple occupation (HMOs) proved to be an additional challenge. Bristol is full of such properties, and many are in poor condition, where individual rooms are let, and do not always need an EPC. In these cases it was impossible to establish if or how GDC funding could be accessed.

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