

Sponsors





and the Built Environment







Acknowledgements

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This report has been informed by the analysis of more than 80 case studies, technical research undertaken by Buro Happold and other external contractors, an extensive literature review, and input from Task Groups and external experts.

Foreword

The Sustainable Development Commission brings over 10 years' experience of collaborative working with national and local government, civil society and business organisations, academia and individual experts. This convening role enables us to better understand differing perspectives on critical issues and, more importantly, to arrive at practical and agreed recommendations for government that reflect the complexity and connectedness of real life.

Whilst this approach is not exclusive to the SDC, what is unique is our responsibility to analyse situations, and to devise solutions and make recommendations which will deliver better, more sustainable outcomes for government. Using a sustainable development lens to consider a range of options can help make the best and most efficient use of scarce resources in the short and long term, whilst also ensuring that we enhance fairness and social cohesion, and respect and protect our natural environment.

Importantly, at a time when decisions are being taken to make severe cuts in budgets and services to tackle the

deficit, this approach is one which can assist Government to make the difficult decisions that they are embarked on.

This report is an excellent example of what the SDC can do to support government. It builds on the experience of numerous case studies which demonstrate the wide range of sustainability benefits that can be achieved from retrofitting and upgrading our infrastructure. The Commission believes that this necessary process can be done in a way that achieves multiple benefits; generating jobs and skills, reducing our carbon emissions and waste and at the same time engaging with communities in a way that ensures that they are part of the process of achieving a better quality of life for themselves and those around them. It is too good an opportunity to miss.

I look forward to receiving your feedback.

Will Day

Chair, Sustainable Development Commission

Enabling communities to renew their neighbourhood property and infrastructure is the most cost-effective way to ensure our villages, towns and cities are fit for the future and create the conditions for people to thrive. *The Future is Local* points to the UK seeing unprecedented levels of engagement from residents, investors and the businesses in the supply chain in an urgently needed boost to economic activity delivering a long-term benefit for these communities.

Managing upgrade works on a neighbourhood basis can encourage greater participation and cut costs by 20-30%. Releasing this capacity will help deliver the scale and speed of change needed to meet the economic, carbon and resource efficiency targets our future depends on.

In examining individual behaviour change implicit in a shift to sustainable living, the gap between intention and action is well documented. Individuals feel constrained by the physical systems that they live and work within – the existing buildings and streets, utility pipes and wires, and the hardware of provision of local services, from bins to bus stops. This local infrastructure, existing in different forms in every neighbourhood as it was invested for different needs over its history, impairs people's quality of life and illequips them for the increasing priority of living sustainably.

The Future is Local presents evidence that there is a major, unrealised opportunity in the UK to unlock this issue by focusing on the optimum scale for addressing these infrastructure reinvestment needs: the neighbourhood.

At neighbourhood scale:

- Engagement of residents can be secured through governance approaches promoting local ownership and high levels of take-up of retrofit measures most appropriate to each community and providing the supply chain and investors with a viable scale of project and structure of partner;
- Technical resource- and carbon-efficiency measures become feasible at whole-street and neighbourhood level that simply don't stack up at individual home scale, including most low-carbon/renewable energy technologies and transport;
- Access to private investment is increased as neighbourhood scale provides 'critical mass', enabling scarce public money to be more effectively leveraged.

This report's recommendations focus on the practical, the 'how' of managing upgrade works on a neighbourhood basis: building capacity at local level, developing and sharing best practice nationally and facilitating engagement by supply chain businesses, funders and policy-makers wishing to see communities successfully taking ownership for changing the place they live.

Dr Stewart Davies

Commissioner

Steering Group and Task Group Membership

The project's Steering Group provided advice on the report content, structure, key messages and recommendations. Members of the Steering Group were:

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Task Groups

The project was also informed by three Task Groups which provided invaluable expertise in the following areas:

- Task Group 1: Practical delivery of infrastructure at neighbourhood level
- Task Group 2: Business and funding models for delivering neighbourhood retrofit
- Task Group 3: Engaging communities in neighbourhood retrofit.

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Executive summary

The physical infrastructure in our villages, towns and cities requires significant upgrading and in doing so we have the opportunity to tackle climate change, deliver reliable and efficient transport networks, improve health and well being, secure a healthy natural environment, improve long-term housing supply, maximise employment opportunities and make our communities safer and more cohesive.

Whilst these opportunities are recognised at a national level for major infrastructure projects, they are not realised for local physical infrastructure. By local physical infrastructure we mean buildings (domestic and non-domestic – including derelict buildings), roads, pedestrian routes and cycle paths, public space, green infrastructure (parks, gardens, playing fields, trees etc.), blue infrastructure (canals, lakes, rivers, etc.), underused land, waste and recycling facilities, underground utilities of electricity (including recharging points), gas, water, Information and Communication Technology (including superfast broadband), and heat networks.

At the same time we are facing a scarcity of public funds. In 2009 the UK's budget deficit was the largest it has been in peacetime history. According to the Chancellor, in 2010 the UK's deficit is set to be among the largest in the world. The new Government has made it clear that tackling the deficit will be the most urgent task it faces. As such it has pledged to significantly accelerate the reduction in the deficit, which will mean substantial cuts in public sector funding.

If we are to make the improvements required to tackle climate change alongside delivering those wider economic, environmental and social benefits that will improve the quality of life for everyone we must look at new ways of working. This means looking at ways in which we can make existing resources work harder through efficiencies, and finding new ways to access private finance.

How we deliver these works is as important as the physical changes – working at the local level provides the opportunity to strengthen communities, to build their social capital and their capacity to respond to local challenges. There is potential not only to transform places but to transform society. To achieve this we must consider how we can galvanise, support and empower communities to come together to decide how to improve the long-term wellbeing of their local areas.

It is in this context that the Sustainable Development Commission has produced this timely report. We believe there is a solution to these problems, a way of cutting our carbon emissions, making our places more resilient to the impacts of climate change and creating a better, fairer and healthier society cost effectively. It comes in the form of integrated neighbourhood retrofit programmes, refurbishment works led by local people to improve the places they live in and equip them for a greener, albeit leaner, 21st century.

What is the issue?

Carbon reduction

One of the most urgent drivers for upgrading existing infrastructure is the need to reduce the UK's carbon emissions by 80 per cent by 2050. As the Commission for Architecture and the Built Environment (CABE) and BioRegional concluded from their involvement in the eco-towns programme, a well-designed, well-built place could help residents achieve a 75 per cent reduction in their total carbon emissions and a 78 per cent reduction in their ecological footprint.²

The most significant contribution can be made from existing buildings. The UK's 21 million homes are responsible for 27 per cent of our carbon emissions.³ The 1.8 million non-domestic buildings are responsible for a further 18 per cent of UK carbon emissions.⁴ Given that 86 per cent of homes standing today will be around in 2050⁵ we need to improve the energy efficiency of these buildings.

A massive programme of works is therefore required to upgrade the existing building stock if we are to meet these targets. How these works are designed, managed and delivered will impact significantly both on the costs and the effectiveness of the programme. Work to achieve 80 per cent carbon reduction from existing buildings is estimated to cost in the range of £200 to over £400 billion for domestic⁶ and in the range of £13 to £50 billion for non-domestic.⁷ Although these upfront costs can largely be recouped in the long-term through resultant energy savings, they are still a barrier for many householders. Our research indicates that costs could be reduced in the range of 20 to 30 per cent if work is undertaken on an area basis (compared to individual house). It also highlights the potential for greater take-up rates of programmes when delivered on an area basis.

Delivering wider sustainable outcomes

Similarly the design, management and delivery of infrastructure upgrades, and how our renewed places function afterwards, will have a huge impact on how sustainably people live their lives. By looking wider than buildings, neighbourhood retrofit programmes will significantly affect people's quality of life, determining how safe and easy it is to move around, how active and healthy people are, and how happy they are to spend time there.

What this research shows is that as well as addressing climate change, an integrated, area-based retrofit programme can deliver a host of economic, environmental and social co-benefits for the same or similar cost outlay. As detailed in the report these works have the potential to:

- Reduce carbon emissions
- Make efficient use of resources
- Improve energy security
- Make places more resilient to the impacts of climate change
- Improve biodiversity
- Create local jobs
- Strengthen local economies
- Improve the quality and value of existing places
- Reduce fuel poverty
- Improve health and reduce health inequalities
- Strengthen communities and improve community interaction.

Avoiding costs of poor infrastructure

In addition to improving quality of life for the UK's citizens, achieving these wider benefits will help avoid significant future costs of poor infrastructure. In the current economic climate it is critical that we take a long-term view to improve the functioning of our existing places.

We need to adapt our existing places to make them resilient to the impacts of climate change. If we fail to do this, Lord Stern estimates that the economic impact from extreme weather alone could reach two per cent of world GDP by 2050.8 Manchester undertook its own 'mini-Stern' review and estimated that the city region risks losing £12 billion over the next 12 years if it fails to adapt – and £70 billion for the wider North West region.9 The floods in the summer of 2007 showed the levels of damage that can be incurred. These cost insurers more than £3 billion.10

We also need to improve our existing places if we are to avoid significant cost to the NHS. SDC's report Health, Place and Nature highlighted how improvements to the built environment, particularly to green infrastructure, can improve both physical and mental health more cost effectively. Obesity already costs the NHS £1 billion a year and £2.3 billion to the wider economy. ¹¹ Mental illness (primarily depression) costs the NHS £12 billion a year and £64 billion to the wider economy. ¹² In addition substandard housing is estimated to cost the NHS £2.5 billion a year and a further £1.8 billion to the wider economy. ¹³

We need to improve how we move around our existing places if we are to avoid significant costs from congestion. If left unchecked it is estimated that congestion will cost England £22 billion by 2025. 14 Improvements to cycling and pedestrian routes provide a benefit to cost ratio of 20:1, compared to a typical ratio of 3:1 for typical road and rail improvements. 15 This does not factor in savings from greenhouse gas (GHG) emissions, which could be significant given that transport accounts for 22 per cent of UK GHG emissions. 16

What are the benefits of an integrated, area-based approach?

In the current economic climate we need to look at how these measures can be delivered most cost effectively to deliver maximum economic, environmental and social benefits. Our research suggests that we cannot afford to continue with the existing piecemeal approach to upgrading neighbourhood infrastructure elements. In addition we need to look for ways of achieving these benefits at the least cost to communities and individuals in the current harsh economic climate, exploring new ways of financing these projects and delivering them.

The Commission believes there are clear benefits of adopting a rational, integrated and co-operative approach. These are reducing cost and disruption; engaging and enabling communities in determining the shape of their neighbourhoods; and utilising resources for local benefit.

Reducing cost and disruption

Many infrastructure improvements deliver multiple benefits. For example, improving green infrastructure improves the resilience of our places to impacts of climate change such as flooding and overheating; it improves physical and mental health; and it provides options for new and improved pedestrian and cycling routes. An integrated approach to spatial planning on an area basis will help to identify opportunities for upgrades to maximise economic, environmental and social outcomes. Integrated planning and delivery of these works will save money through shared infrastructure, single community engagement processes and integrated delivery. It can also minimise disruption for residents and businesses during construction and maintenance.

As our case studies and research demonstrate, area-based energy efficiency programmes have elicited greater take-up rates, and cost savings of 20 to 30 per cent. The Cardiff Partnering Scheme, which retrofitted 100 homes and five blocks of flats, found that an area-based approach reduced costs to householders by at least 20 per cent, compared with having homes upgraded individually. The council was able to pass on these savings to homeowners which, along with improvements to the quality of visual appearance, encouraged them to have works undertaken.

Engaging and enabling communities

We have found that there is more opportunity for local people to become involved in improving their

neighbourhoods through an integrated programme than through one which focuses on a single issue, such as carbon. People want better places. This means places where they feel safe, homes that are affordable to heat, neighbourhoods that are resilient to extreme weather events, well maintained public space and parks to relax and play, convenient pedestrian and cycle routes, and access to public transport.

Our research has identified a variety of different routes in to engage communities. In Todmorden the community initially came together to produce local food. They are now working with a range of bodies including the council, schools, doctors and other bodies to implement their plans. This includes the establishment of a social enterprise to produce fish, vegetables and fruit; a network of people keeping chickens for the sale of eggs; and working with local traders to promote local food.

Most significantly, this approach creates an opportunity for people to work together in communities to build a stronger, more cohesive society and to encourage and enable people to make sustainable choices in their day-to-day living. As this report highlights, long-term shifts in behaviours and habits are most likely to be achieved where communities have a strong role. The commission believes this approach will engender positive long-term change by building the capacity of neighbourhood groups, social enterprises, other third sector bodies and local government to work together and solve local issues. Working through neighbourhood partnerships can empower communities to make decisions about how their areas are managed, and about where the profits from new investment opportunities should be directed to improve long-term well being.

Utilising resources for local benefit

We have found that working in an integrated, area-based way can enable communities to receive greater benefits from local resources. This can be achieved by integrating different elements to achieve a more efficient supply and usage of resources – such as re-using waste heat from a power station to heat buildings, or generating energy from waste material and sewage.

Similarly, some of the elements introduced as part of a neighbourhood retrofit programme may generate income. If an integrated approach is taken there is potential for neighbourhoods to benefit from this income generation, and reinvest surplus profits locally, for example into other

retrofit works. New ways are needed to enable local people to benefit from the development of local infrastructure.

In Fintry, Scotland, a community-owned wind turbine generates 8,000MWh of electricity which is sold, helping to pay off their original loan and meet running costs. Surplus profits of £50,000-£100,000 a year go to the Fintry Development Trust, made up of 150 residents. The money has been used to make homes in the village energy efficient by providing free insulation.

Working at an area basis also increases potential to build capacity in local firms and create local jobs, as well as increasing the viability of some technologies. Area-based delivery through the Kirklees Warm Zone had provided over 127,000 energy assessments, delivering loft insulation to almost 37,000 properties and cavity wall insulation to over 17,000. Through this work the Warm Zone has directly created over 100 jobs per year for three years, and indirectly created an additional 29 jobs per year. In addition, a leading installer of energy conservation systems has built a local depot and training centre nearby. Over 200 fitters have been trained so far.¹⁷

What is preventing an integrated, area-based approach?

Retrofit programmes focused solely on a single outcome, such as carbon reduction, will limit the potential to deliver the multiplicity of benefits outlined in this executive summary so far. We have reviewed over 80 case studies, worked with almost 50 experts from the fields of community, delivery and finance and commissioned research on scenarios for neighbourhood infrastructure upgrades. From this we have found that the most common barrier preventing the integration and delivery of the wider sustainability benefits in retrofit programmes is the lack of a single body driving and coordinating the planning and delivery of work. The identification and/or development of such bodies was seen as key to unlocking many of these issues, engaging others in the community and bringing together public and private sector stakeholders.

As our case studies demonstrate there are some bodies who are taking on this role. These come in a range of structures, which includes amongst others informal community groups, co-operatives, development trusts,

social enterprises, parish councils, local authorities and local strategic partnerships. For the purpose of this report we call these 'neighbourhood partnerships'.

The case studies in the report are the success stories – those that are managing to deliver real improvements in the long-term well being of their local areas. From our discussions with these communities and wider stakeholders however, it is clear that neighbourhood partnerships are too often hindered by a lack of support (mentoring, technical, organisational) and poor access to finance (especially for seed funding and core costs). This lack of technical support and access to finance can hamper their ability to develop schemes which utilise resources effectively to create maximum economic, environmental and social value. There is now an opportunity for Government to address these problems through their recently announced plans to support community organisers and to establish the Big Society Bank.

What are the key principles of an effective neighbourhood partnership?

There is a greater recognition of the need to work in partnership at a local level to improve the functioning of existing places. The past year has seen development of a number of programmes and pilots to encourage greater partnership, particularly between energy companies, local authorities and community groups. These include DECC's Community Energy Saving Programme, CLG's Local Carbon Frameworks, London's Low Carbon Zones and the Low Carbon Communities Challenge. The Strategy for Household Energy Management¹⁸ also sets out a new model of

delivery, through partnerships between energy companies, local authorities and other local organisations. Too often however, these pilots focus on single issues such as carbon and do not give an effective role to communities. If they are to maximise use of resources effectively to deliver long-term improvements to the well being of their areas we need neighbourhood partnerships to take a wider focus.

We have found from our research that there are some key principles which make an effective neighbourhood

partnership. These will vary according to local circumstances, but the partnership should ideally:

- Be a multi-disciplinary partnership involving communities, local authorities, infrastructure owners and other players, particularly those with finance, decision-making powers and technical expertise
- Take a form appropriate to local need and resources, with leadership from either the community or local authority. This should build on existing partnerships and delivery structures where appropriate
- Have a *long-term*, ongoing presence and interest in the neighbourhood.

What does an effective neighbourhood partnership do?

A neighbourhood partnership's role is to drive and coordinate the planning and delivery of sustainability improvements at a local level, which have been identified as priorities by the community. These partnerships should aim to improve infrastructure at a local level so as to deliver carbon reduction and adaptation measures while at the same time achieving wider economic, environmental and social benefits.

Partnerships should gather together a team interested in taking forward the neighbourhood retrofit work, develop a vision and targets, produce spatial neighbourhood retrofit plans, and develop a delivery and funding model.

Who could be involved in neighbourhood partnerships?

Communities

Engaging communities in the development of their neighbourhoods will significantly increase the longterm benefits neighbourhood partnerships deliver. This can be achieved through increasing participation in retrofit programmes through simple word-of-mouth recommendations and inspiration from real-life examples (friends, family and neighbours); encouraging and enabling sustainable behaviour change through structured learning from trusted intermediaries and support groups; or the active involvement of communities in designing and managing programmes of works. Feedback from the New Deal for Communities (NDC) programme found that the critiquing of local services by residents was 'absolutely vital in making more focused, refined and fit-for-purpose local delivery vehicles'. Its report noted that 'some of the most successful projects...are those where we have engaged residents in the design of the process; and some of our least successful projects, including some of the disasters, have been the ones where we haven't.'19

Involving the community can also save money. On a £2.2 million housing redevelopment project for the Shoreditch

Trust in north London, savings due to community engagement were estimated to be in the region of £500,000. Compared to other projects, there were fewer delays and associated costs caused by responding to residents' complaints, reworking designs at a late stage to meet user needs, and on-site events such as vandalism and crime.²⁰

In south London, the award-winning Bellenden Renewal Area benefited from community engagement from the outset. Southwark Council asked residents how they wanted their streets to look and allowed each street to choose designs for its walls, gates, paving and street lighting. More than 60 local artists contributed, including Antony Gormley and Zandra Rhodes, and the oncerundown backstreets are now one of the most desirable neighbourhoods in the area. House prices are estimated to be 15-20 per cent higher than in surrounding streets. Where whole streets have been improved together, properties are estimated to command premiums of up to 25 per cent. Now, Southwark Council is using lessons learnt in Bellenden in its Low Carbon Zone, where residents are being used to spread information via community 'EcoTeams'.

Local authorities

Local authorities (LAs) deliver, or have some responsibility for, more than 700 different services ranging from education, transport and public health, to environmental stewardship. Given their level of local knowledge, and the fact that they own most of a neighbourhood's public space, the involvement of LAs is essential to any infrastructure upgrades. Research shows that they are trusted by communities – considerably more than energy suppliers. LAs also exert influence over planning and finance, meaning they have a key role to play in the development of neighbourhood partnerships.

Why would local authorities want to become involved? Like central Government, they have environmental targets to meet as outlined in their Sustainable Community Strategies (SCSs) and accompanying action plans. The Sustainable Development Lens, a benchmarking tool for local authorities developed by the Commission and the Improvement and Development Agency (I&DeA), shows that upgrading existing infrastructure has a direct and positive impact on the majority of sustainability measures for their area. The recent announcement by Government to devolve more powers and responsibilities to local government could enable the integrated partnerships to promote action at a local level.

Others

These might include infrastructure owners (utility companies, registered social landlords), potential funders, local businesses or social enterprises, other third sector bodies, Local Strategic Partnerships (LSPs) and those with technical delivery skills.

In south London, Southwark Council has established a Multi Utility Services Company (MUSCo) to integrate the delivery of utilities across 30 hectares of mixed-use development at Elephant and Castle. The MUSCo comprises Dalkia (providing management services). Veolia Water and Independent Fibre Networks Limited, working together with the council and the master developer, Lend Lease, to deliver carbon neutral heating, cooling, electricity, nonpotable water and data connectivity services to the area. Having a single body responsible for a range of elements cuts costs and minimises disruption by use of shared ducting and avoiding duplication of works. Other research highlighted in this report indicates that delivering energy efficiency retrofits through partnerships between local authorities and energy companies can deliver £6 billion in benefits over the lifetime of the strategy, compared to £4.2bn for a local authority-led model and -£0.3 billion for an energy company-only model.²¹

The solution: Mainstreaming neighbourhood partnerships and an integrated approach

We need to mainstream this approach if we are to achieve the scale of activity required to meet Government targets on carbon whilst at the same time delivering a wide range of sustainable co-benefits cost effectively. To achieve this we need Government to:

Prepare the ground

There is currently no clear policy support for retrofitting existing places to make them more sustainable. If we are to avoid substantial costs in future and we are to achieve the multiple benefits of delivering retrofit through an integrated, area-based approach Government must act to give a clear policy lead to support the scale of works required to upgrade our neighbourhood infrastructure.

If we are to achieve this then Government must end the focus on single issue pilots and programmes and move to capture the benefits of joining up delivery on the ground. For neighbourhood partnerships to be effective Government policies and programmes need to enable and

support integration at the local level. This will require action from all departments across Government, not just those with lead responsibilities on communities and climate change.

Coordinate support

Support required by neighbourhood partnerships will vary according to their stage of development and aspirations. Our research and case studies suggest key areas for help are likely to be:

- Handholding support and capability-building for local authorities and community groups on technical, financial and legal issues, and project management
- Seed funding for core costs and research and development projects
- Development of best practice based on feedback, monitoring (including effective data reporting), and research and development projects
- Development of procurement panels.

A number of government and third sector bodies provide support to local authorities and community groups. Whilst some of this is valued, it can be hard to access as it is delivered through a myriad of different organisations, all with differing targets and objectives. Their dispersed nature means it can be difficult for partnerships to know where to go for advice. From talking to our expert colleagues and case study contributors, it would appear there is duplication of resources in some areas (such as web-based tools) whilst there are clear gaps in others (mentoring, capacity-building, opportunities for sharing best practice and financial advice). Existing structures can also make it difficult for communities to develop their own solutions.

There is potential to streamline existing support structures to make it easier for communities and local authorities to access them. To achieve this, it is recommended that a single department coordinates the provision of support, and that users would be able to access the full range of support through a single interface. As well as improving usability, this would provide a portal through which user needs could be monitored, and best practice identified and shared. It could also reduce overall costs of such services by removing duplication, and support communities to develop and share their own solutions. The Government's recent proposal for more powers and support for local communities to shape their neighbourhoods are welcome as they will assist in tackling the barriers identified by the Commission in this report. These policies must be developed in an integrated way, looking at how they can work with and improve existing provision if they are to address the issues raised in this report and deliver maximum benefit on the ground.

Unlock funding

Public sector funds will be very constrained so we need to use what is available more effectively. This means giving a greater capability to neighbourhood partnerships to influence how public sector funding (and that over which the public sector has some influence, such as the new obligation on energy companies) is used in their area. Proposals to give greater financial autonomy to local government and community groups are a welcome addition to this capability. We urge the government to look closely at the neighbourhood level when reviewing ways to devolve power and greater autonomy to local government and community groups.

As detailed in the report some neighbourhood retrofit upgrades can generate profit in the short- and long-term, delivering quick and slow wins to investors. However, it

can be difficult for neighbourhood partnerships to access institutional investment. Institutional investors typically require investment scales of circa £50 million for equity investment, and £100 million for debt investment. If neighbourhood partnerships are to attract private sector investment we need to develop mechanisms which make it easier for them to access finance. The proposed Green Investment Bank provides an opportunity for Government to develop such a mechanism. To enable this, the bank must unlock finance for neighbourhood-level projects alongside large-scale strategic infrastructure.

If places are to be truly sustainable in the long-term however, we must move beyond simply attracting institutional investors. We need to enable communities to develop self-sustaining local investment vehicles which retain and re-invest any surplus profits for community benefit. These surplus profits can be used to help to fund those projects which have no direct revenue-generating potential but can deliver a range of community benefits.

To support local investment vehicles we need to be smarter about how we use the limited public sector finance there is available. The early stages of projects (scoping and development) carry the highest risk to investors. Public sector resources could be used to minimise this risk and allow projects to progress. This can be achieved through a variety of methods including public sector underwriting, use of public assets, seed funding for scoping works (potentially provided from the Big Society Bank), research and development, and setting a clear policy framework. When deciding how public money is spent, consideration should be given to how it could provide a return for local re-investment.

Some projects, especially those with no costed benefits, will still require public subsidy. These can be funded by a variety of means including using the surplus profits from quick- and slow-win projects (where there is local investment or a community tariff on private sector development); 'allowable solutions'; section 106/Community Infrastructure Levy/tariff; and other local green charges.

The Commission calls on the Government to recognise the benefits that can be achieved through upgrading neighbourhood infrastructure in an integrated way, the scale of the challenge, the costs of inaction and the urgency to take action. To achieve this they must encourage, enable and empower neighbourhoods to work together to shape their areas into something bigger and better – to transform the long-term functioning and sustainability of both place and society.

Summary of Recommendations

SDC calls on Government to encourage, enable and empower communities, local government and other bodies to work together to drive, plan and coordinate delivery of *integrated neighbourhood retrofit* **programmes to achieve sustainable places.** These neighbourhood partnerships should deliver a range of sustainability outcomes *alongside* carbon reduction and adaptation measures in an integrated way which will deliver maximum economic, environmental and social outcomes cost effectively.

If we are to mainstream this integrated, area-based approach Government needs to:

Prepare the ground

- Government should support an integrated, area-based approach to upgrading local infrastructure as a cost effective way of achieving maximum sustainable outcomes in an area.
- How This would be supported by: ensuring existing and new polices and delivery programmes (such as the new obligations on energy companies post-2012) are flexible in operation to support integrated delivery; improving the evidence base to assess the economic, environmental and social benefits of this approach; and developing pilot projects which test integrated delivery.
- Government should improve the evidence base on the cost-effectiveness and benefits (monetised and non-monetised) of working with communities to deliver sustainable outcomes.
- How This should include a review of current and completed programmes such as the Low Carbon Communities Challenge, Greener Living Fund, NESTA's Big Green Challenge, the Community Energy Saving Programme (CESP) and Scotland's Climate Challenge Fund. It should also look to learn from previous area-based delivery programmes.

- Given the urgency in tackling climate change and the critical role local authorities can play in enabling, encouraging and engaging people to undertake action, the local authorities' role as local leader on climate change mitigation and adaptation measures should be formalised.
- **How** This could be achieved through a requirement to set mandatory targets on climate change mitigation and adaptation (National Indicators 186 and 188) or by making this a duty on local authorities.
- Government should ensure that regulatory frameworks for infrastructure and utility providers enable and support an integrated, area-based approach to achieving sustainable outcomes.
- **How** A 'fit for purpose' review of existing regulatory structures should be undertaken to identify potential regulatory obstacles preventing an integrated, area-based approach to upgrading local infrastructure.

Coordinate support

The department for Communities and Local Government (CLG) should have responsibility for coordinating cross-governmental support for neighbourhood partnerships.

How This should be informed by and build upon existing support being provided to both local authority and community-led partnerships. CLG should simplify the process for neighbour-hood partnerships to access the advice, through the creation of a single interface. In addition to improving usability this will help ensure that services meet the need of users without duplication of resources.

Likely areas requiring support are:

- long-term enabling advice, technical support (particularly on the use of the Well Being Power) and capacity building for local authorities
- technical, financial and legal advice, mentoring, capacity building, and project management for community groups
- access to funding, particularly for initial investment and core costs.

Unlock finance

Public sector funding mechanisms should promote devolution of funding to neighbour-hood partnerships to enable them to influence decisions on how public sector money is spent in their area.

How Neighbourhoods should be provided with greater information on local public expenditure, potentially by providing neighbourhood level breakdowns as in the Local Spending Report. The Government's review of local government finance should look at the issues raised by the Total Place pilots, Total Capital case studies and Total Capital and Asset pathfinders, and promote ways to devolve greater financial autonomy to neighbourhoods.

A new Green Investment Bank should direct finance to a wide range of low carbon infrastructure projects including energy efficiency at a variety of scales, including neighbourhood.

How Support could be provided through:

- providing capital or guarantees where private finance is unwilling to take the risk
- bundling small projects to attract wider investment
- providing a brokering service between private, public and third sectors
- raising capital (for example, through Green Bonds) for sustainability projects identified by the partnerships.

8 Government should minimise development risk through provision of clear policy support for neighbourhood retrofit.

How The standards and timeline for introduction should be defined now but phased in as mandatory over a period to enable building owners to prepare for these works. All homes should meet minimum energy efficiency standards. The UK Government should also equalise VAT for repairs and refurbishment works in domestic properties, with new build.

9 Local authorities should be enabled to borrow against Feed-in-Tariff and Renewable Heat Incentive income streams.

How The Treasury should implement this as a matter of urgency now that Feed-In-Tariff is operational.

Government should create ways in which local communities are able to derive long-term benefits from the siting of low carbon energy infrastructure, such as new housing or wind turbines, in their area.

How This could include enabling communities to purchase a share in the development, providing them with an ongoing share of the increase in business rates or a community tariff. In addition, 'allowable solutions' (i.e. offset payments for new homes unable to meet zero carbon levels onsite) could be paid to the local authority and used to fund low carbon projects identified in neighbourhood partnerships' delivery plans.

Case study – Community leadership and professional project management support in Sanford Housing Co-operative



Sanford Walk is a self contained housing co-operative of 14 shared houses and six self-contained flats set up in the 1970s, which has achieved a 60 per cent cut in carbon emissions from 2003 to 2008. To reach their target the co-operative has successfully coupled the community engagement and leadership which drives their scheme, with professional project management and support.

Sanford's residents act as collective landlord and therefore own, control and manage the estate. When refurbishment works were required in 2002 they decided that they should take the opportunity to invest their maintenance fund in a programme of works focused on improving sustainability and reducing their energy consumption.

The residents required technical support to understand how they could use their funds most effectively in achieving their goals. The group commissioned a feasibility study by the Centre for Sustainable Energy to investigate potential methods. Following a successful grant application to EST's Innovation Programme, DTI's PV programme and Clear Skies they were able to commission architects and engineers to present project proposals. To enable effective delivery the group also appointed project managers who were critical in getting measures delivered effectively and on time. Because of their expertise in the area the project management team were also able to access additional funds that the community had not been aware of. Ongoing support is now provided through residents (who were trained as part of the project) and a permanent support officer from CDS Cooperatives.

Consultation with residents was central to the project. Residents were surveyed at the start of the project to determine their priorities and ongoing communication was achieved through regular meetings and information provision. All major decisions had to pass majority vote, including the need to increase rents to fund work, which was approved by 87 per cent of residents.

Sanford has reduced its carbon emissions from 228 tons in 2003 to 91 tons in 2008, achieving the 60 per cent ambition. The group also consider that overall awareness of energy and environmental issues has increased, yielding behavioural changes inside and out of the home. The project achieved this through:

- Replacement of 14 gas fired combination boilers with 7 mini biomass boilers
- Installation of solar hot water systems and thermostatically controlled roof windows for passive stack ventilation
- Installation of loft (270mm) and cavity wall insulation
- New communal food growing and bicycle storage areas using recycled materials
- Repair and redecoration using sustainable and toxin-free materials, incorporating residents' own designs.

Case study – **Association of Greater Manchester Authorities:**maximising economic benefits through city scale delivery



Working at a city region scale, Greater Manchester is developing a high level of commitment from public and private sector partners to ramp up delivery scales and timings, resulting in greater economic benefits.

In December 2009, Greater Manchester was designated the UK's first Low Carbon Economic Area (LCEA) for the Built Environment. The LCEA will build on the city region's strong track record in regeneration in the built environment, and its world-leading university and research capabilities in the low carbon built environment.

The LCEA programme is based around a five-year retrofit programme, which will be one of the largest initiatives of this type in the world. If its most ambitious targets are realised, it is anticipated the works would save 6 million tonnes of CO₂ from homes, public and commercial buildings in Greater Manchester, creating an additional £650 million for the economy and supporting 34,800 jobs.

The scale of the retrofit works are intended to shift delivery from the current sporadic CERT-led approach into a strategic programme that can be linked to job creation and other public sector initiatives to improve quality of existing places. The scale will also enable testing of key features around funding and delivery. These include:

- financing models and mechanisms for attracting new sources of finance; and
- how Total Place principles can improve delivery and funding structures for retrofit works.

While collaboration is required at city region scale to

generate the high level of buy-in from partners to maximise economic benefits, the retrofit measures will be delivered at neighbourhood level. Delivery structures will build on Greater Manchester's long history of working with communities to transform existing places, such as Housing Market Renewal Areas in Salford/Manchester and Oldham/Rochdale, Hulme and East Manchester. It will build upon their experiences of delivering area-based retrofit and behaviour-change programmes.

The LCEA will also focus on developing new retrofit technologies; the associated supply chain; business models; and how these can stimulate business opportunities and increase employment levels.

Initial work on the design of the programme has been carried out by teams from Greater Manchester's commissions for the Environment and the New Economy. The Energy Saving Trust is closely involved with the design and delivery of programmes. In addition, assistance has been provided by the North West Development Agency (NWDA) and the Homes and Community Agency (HCA).

The designation of Greater Manchester as an LCEA is anticipated to create market confidence through widespread public- and private sector commitment to the retrofit programme. This support will be detailed in the Joint Delivery Plan, which will be agreed with Government, its key agencies and NWDA. At a local a level it is anticipated that the ten local authorities, registered social landlords, private sector landlords, universities and further education establishments and new skills and training organisations will be signatories to the Plan.

Case study - Heads of the Valleys Low Carbon Zones, Wales



The Heads of the Valleys Low Carbon Programme is a regeneration strategy which has developed a 'low carbon zone' model that is now being replicated across Wales to deliver jobs through upgrading existing housing.

The programme has been developed in partnership between five local authorities (Rhondda Cyon Taf, Merthyr Tydfil, Caerphilly, Blaenau-Gwent and Torfaen) and is delivering large-scale home energy assessment, energy efficiency improvements, and renewable energy technologies through a rolling programme of neighbourhood-scale, area-based delivery.

To date the programme has delivered over 1,500 microgeneration renewable energy systems such as solar PV and solar hot water systems to social housing schemes. External wall insulation has also been installed to suitable properties, and a rolling programme of cavity and loft insulation is underway. Additionally the programme is gaining community integration through a project which aims to improve the energy efficiency of local rugby clubs and sports facilities.

Funding has been provided for retrofitting social housing. However, many private sector residents have

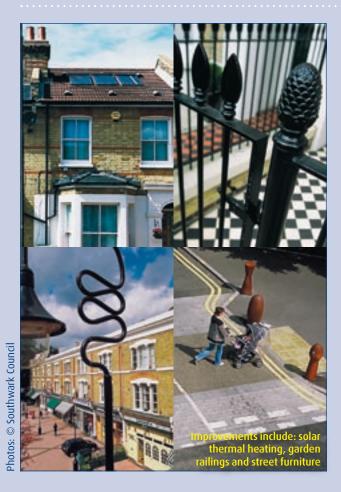
shown an interest in participating – especially given the financial savings (costs are estimated to be 20-30 per cent lower when work is undertaken as part of the scheme) and improvement in visual quality. The social housing providers managing the delivery are looking into the possibility of providing loans to private households, to cover the upfront costs of these measures.

The Heads of the Valleys model is being replicated across Strategic Regeneration Areas in Wales, through the 'Arbed' (Welsh for 'to save') scheme, which was launched in May. The scheme has a total value of £30m and will target approximately 6,000 across Wales. Specifically the scheme aims to benefit people in fuel poverty through insulation measures and renewable energy.

This guaranteed demand encouraged British Gas to open the UK's first dedicated Green Skills Training Centre in the area. The centre is intended to train more than 1,300 people each year. This will include specialist help to enable local long-term unemployed people find work in the green economy. British Gas will also use the centre to train its own staff in renewable technologies.

Photo: © Seddon Group

Case study – Southwark Council: improving outcomes through resident engagement



Southwark Council are employing many of the lessons learnt from the award winning Bellenden Renewal Area to the development of their Low Carbon Zone. Bellenden Renewal Area operated from 1997-2007, delivering a range of housing, environmental, employment, economic, community development, crime and health benefits.

The renewal area is predominantly privately owned properties (78 per cent at the start of the scheme – a mixture of owner occupied and private rental homes and small retail units) and works were delivered on a cross tenure basis.

The council successfully engaged with residents by seeking their views on local problems and suggested solutions. Decisions on buildings' and streets' appearance were devolved to residents, and residents received construction training. This community-led approach garnered high levels of take up even though participants were asked to make a financial contribution. In one street a single householder was unwilling to participate because he did not want the council interfering with his property, but residents

conveyed the benefits and persuaded him to join in.

The scheme also demonstrates how community involvement can deliver innovative and inspiring outcomes. Residents were keen to see environmental improvement monies used creatively and could see no reason why local artists shouldn't be involved in the designing of walls, gates, paving, street lighting, traffic islands and more. The Council drew on their local assets and involved over 60 local artists (including Antony Gormley, Zandra Rhodes, John Latham and Tom Philips), most of whom provided their services for noor minimal fee.

The scheme has successfully transformed the Bellenden area of Peckham from a run-down back street into a desirable neighbourhood, with house prices 15-20 per cent higher than those in surrounding streets, and up to 20-25 per cent higher where whole streets have been improved. It also trialled a number of innovative environmental measures including solar heating systems linked to individual condensing-combination boilers. The scheme has won a number of awards including NHIC's 'local authority that has done the most to promote the repair of homes in the private sector' and BURA's Best Practice in Regeneration award.

The council are employing many of the lessons learnt in their LCZ. These include:

- spreading information through residents and existing community networks. They are working with Global Action Plan to develop EcoTeams to disseminate information to friends, family members and neighbours
- engaging residents on overall sustainability of a place or their immediate problems/interests that the scheme can deliver (such as new windows, environmental realm improvements or better recycling) rather than carbon and climate change
- being clear about parameters when giving residents control. If the scheme must deliver 80 per cent carbon reduction this must be clear from the start

A key concern at the LCZ is the lack of a single funding source. This results in programmes being developed around available funding (and its often restrictive qualifying criteria) rather than outcomes. This approach limits the amount of true community involvement in the process. It also hinders the potential to deliver the measures that would provide the most effective carbon and sustainable outcomes in the area.

Case study – Sustainable Blacon: community leadership of an integrated programme of works



Sustainable Blacon Ltd. (SBL) was established by Blacon Community Trust (BCT) to take forward the community's aspiration of becoming a model sustainable urban community, with 20 per cent reduction in carbon emissions within three years. To achieve this they are looking in an integrated way at four key areas: energy; green space; transport and social enterprise. Their intention is that these works should also bring new life and investment to an area with significant deprivation.

The group has evolved from previous regeneration initiatives in the area. It builds upon experience of developing partnerships between the community and other organisations to improve the quality of life. BCT was set up in 1984 and has developed a range of community services. These include social enterprises, enterprise coaching and incubator support for neighbourhood businesses and a vocational training centre. It also has an income generating arm. BCT works with Chester and District Housing Trust on neighbourhood management (following on from the Neighbourhood Management Pathfinder).

The people managing Sustainable Blacon are local residents, representatives from Cheshire West and Chester Council, the Chester and District Housing Trust and expert advisers in energy, green spaces and urban design. Through this body the community is leading the process and discussions with key players such as DECC, energy companies (home energy consumption reduction, renewable energy technology installation and new technology development), Cheshire West and Chester Council, West Cheshire Primary Care Trust, and the Northwest Regional Development Agency. Their organised approach meant that they were one of the first communities selected in DECC's Low Carbon Communities Challenge and be recognised by British Gas in their Community Energy Saving Programme.

The Low Carbon Communities Challenge research programme aims to achieve an overall target of 20

per cent reduction in household energy bills with corresponding CO₂ emissions reductions. These are:

- 1 Establishment of two demonstration houses to provide energy efficiency information and practical advice to local residents and promote low carbon technologies and living
- 2 Trial of Energy Management Systems (EMS) in 150 homes representative of community, faith and service groups across Blacon. 100 will have EMS installed and 50 will be a control group. All 150 will embark upon a community-based sustainability programme.

Further work planned in the area includes:

- Demonstration energy projects district heating and renewable power microgrid in mixed use redevelopment, energy efficiency retrofit at key community building and external cladding of three high rise blocks
- Working with British Gas to trial new smart meters
- Engaging the community in energy efficiency through a programme of thermal image surveying delivered by volunteers and Blacon High School
- Improving green spaces
- Improvements in the cycling and walking infrastructure along with cycle training and maintenance courses
- Establishment of a new Furniture Re-use Project diverting 74 tonnes of reusable furniture from landfill per annum.

Both SBL and the local authority believe that initiatives to reduce carbon emissions will be much more effective if they are led by community groups in delivering long lasting behaviour change. This is based both on their experience of neighbourhood management and research undertaken by Ged Edwards (Sustainable Blacon's CEO) into Ashton Hayes' *Going Carbon Neutral* project. The local authority is looking into the potential of trialling integrated local service delivery in the area.

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- **19** CLG 2010. What works in neighbourhood-level regeneration? The views of key stakeholders in the New Deal for Communities Programme.
- **20** Example drawn from a study at Fellows Court, Shoreditch, with the costings ascertained by Dearle and Henderson Ltd.
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The small print

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Art Direction and design Andy Long



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We are the only organisation charged with reporting publicly, independently and impartially on how well Government decisions contribute towards a fair, healthy and prosperous future for everyone.

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