



Waverley Borough Council
Carbon Management Plan (CMP)
2010 - 2015

Contents

Foreword from the Environment and Climate Change Portfolio Holder	4
Foreword from the Carbon Trust	4
Glossary	5
Management Summary	6
1 Introduction	10
2 Carbon Management Strategy	11
2.1 Context and drivers for Carbon Management	11
2.1.1 National Drivers	11
2.1.2 Regional Drivers	12
2.1.3 Local Drivers	12
2.2 Our low carbon vision	12
2.3 Strategic areas of focus	13
2.4 Targets and objectives	13
3 Emissions Baseline and Projections	14
3.1 Scope	14
3.2 Baseline	14
3.3 Projections and Value at Stake	15
4 Carbon Management Projects	17
4.1 Progress so far	17
4.2 Existing projects	17
4.3 Potential future projects	18
4.4 Assumptions	20
5 Carbon Management Plan Financing	21
5.1 Quantified benefits	21
5.2 Non financial benefits	22
5.3 Other sources of funding	22
6 Actions to Embed Carbon Management in Your Organisation	23
6.1 Corporate Strategy – embedding CO ₂ saving across your organisation	23
6.2 Programme Management – bringing it all together effectively	23
6.3 Responsibility – being clear that saving CO ₂ is everyone’s job	23
6.4 Data Management – measuring the difference, measuring the benefit	24
6.5 Communication and Training – ensuring everyone is aware	24
6.6 Finance and Investment – the money to match the commitment	24
6.7 Policy Alignment – saving CO ₂ across your operations	24
6.8 Engagement of Schools – influencing Schools to reduce their carbon footprint	25
6.9 Engagement of your Suppliers – working with suppliers to reduce your carbon footprint	25
7 Programme Management of the CM Programme	26
7.1 The Programme Board – strategic ownership and oversight	26



7.2	The Carbon Management Team – delivering the projects	27
7.3	Succession planning for key roles	27
7.4	Annual progress review	28
Appendix A: Carbon Management Matrix - Embedding		29

Foreword from the Environment and Climate Change Portfolio Holder

Waverley is an ambitious Council, and always trying to improve the many public services that we provide to our residents. Carbon management is in line with our corporate priorities and we have the vision of making Waverley a low carbon authority.

We embarked on the carbon management journey because we recognised the importance of getting our house in order and leading our community by example. We have set ourselves an ambitious target of 25% CO₂ reduction by 2015 and we will do all we can achieve this and more.

The climate change challenge is one of the biggest we have ever faced but we are confident that employees of the borough council will pull together and help us achieve this ambitious plan. Set an example that the rest of the community will follow enthusiastically.

Cllr John Sandy
Portfolio holder for environment and climate change

Foreword from the Carbon Trust

Cutting carbon emissions as part of the fight against climate change should be a key priority for local authorities - it's all about getting your own house in order and leading by example. The UK government has identified the local authority sector as key to delivering carbon reduction across the UK in line with its Kyoto commitments and the Local Authority Carbon Management programme is designed in response to this. It assists councils in saving money on energy and putting it to good use in other areas, whilst making a positive contribution to the environment by lowering their carbon emissions.

Waverley Borough Council was selected in 2009, amidst strong competition, to take part in this ambitious programme. Waverley Borough Council partnered with the Carbon Trust on this programme in order to realise vast carbon and cost savings. This Carbon Management Plan commits the council to a target of reducing CO₂ by 25% by 2015 and underpins potential financial savings to the council of around £800 thousand.

There are those that can and those that do. Local authorities can contribute significantly to reducing CO₂ emissions. The Carbon Trust is very proud to support Waverley Borough Council in their ongoing implementation of carbon management.

A handwritten signature in black ink, appearing to read "Richard Rugg".

Richard Rugg
Head of Public Sector, Carbon Trust



Glossary

BAU	Business As Usual
BMS	Business Management System
CM Team	Carbon Management Team
CMP	Carbon Management Plan
CMT	Corporate Management Team
CO ₂	Carbon Dioxide
CRC	Carbon Reduction Commitment
DEC	Display Energy Certificate
GOSE	Government Office South East
LAA	Local Area Agreement
LACM	Local Authority Carbon Management
NI185	National indicator 185: related to emissions for local authority operations
NI186	National indicator 186: related to emissions for local authority area
SCS	Sustainable Community Strategy
VAS	Value At Stake

Management Summary

Background

Waverley first demonstrated its commitment to act on Climate Change in 2006 by signing the Nottingham Declaration¹ and soon after by producing a Climate Change Action Plan. The importance of getting our house in order is in line with the Government's pressure on local authorities to set the example. We embarked on the Carbon Management programme in 2009.

The reason for Waverley tackling climate change is a mixture of local, national and regional drivers.

Our Drivers:

- Corporate priorities
- Energy prices
- National indicators
- Local Area Agreement
- Community leadership

Vision

Local authorities have a crucial role in tackling climate change as community leaders and service providers. Waverley's vision for this programme is to become a low carbon authority and lead our community by example. To achieve this we set ourselves an ambitious target:

Waverley will reduce CO₂ emissions from Council operations
(from 2008/09 levels)
25% by April 2015 and 34% by April 2020

Baseline

As part of reporting for NI 185 (CO₂ emissions for local authority operations), we started monitoring energy and fuel use from our operations during 2008/09. This helped identify our main CO₂ contributors. This information forms Waverley's baseline, to measure the reductions we will achieve in the years to come. This was important in prioritising areas where the biggest savings opportunities are likely.

Waverley's Carbon Footprint in 2008/09 was:

5,397 tonnes of CO₂

Figure 1 below shows the breakdown of those areas to focus on are Leisure centres, the main council office building and our contractors.

¹ The Nottingham Declaration is a commitment by local authorities to tackling the effects and causes of climate change. Over 300 councils have signed the declaration since 2000. Waverley signed it in 2006.

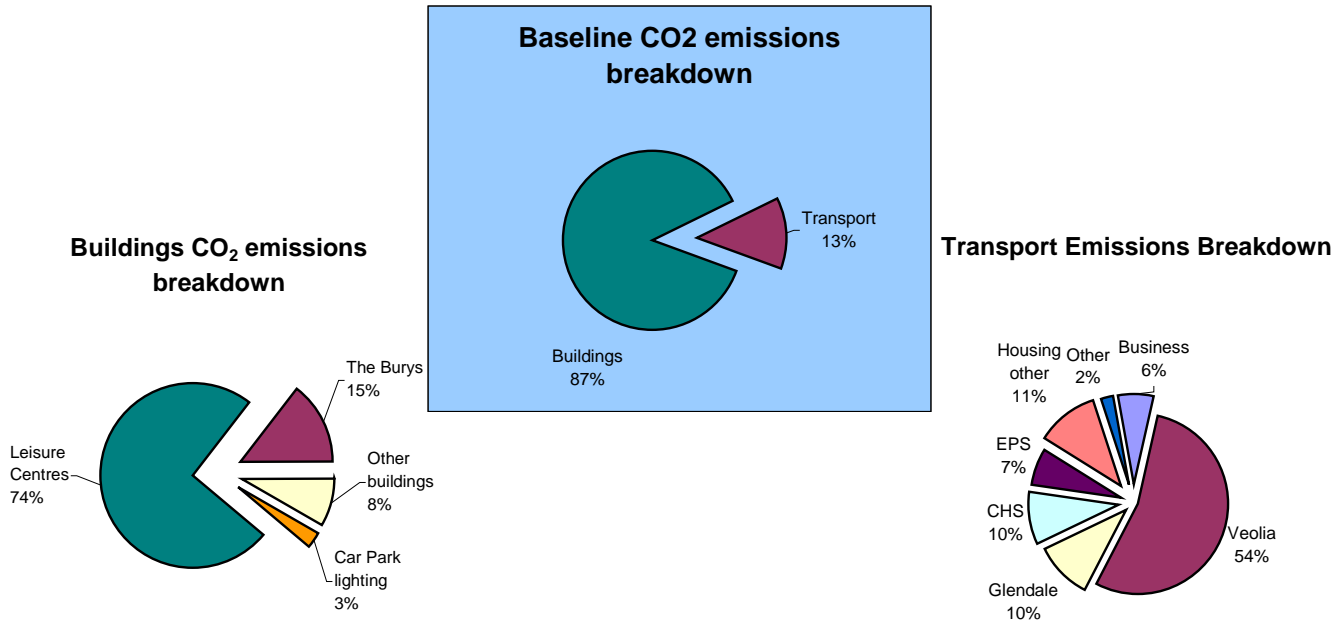


Figure 1. Summary of emissions for 2008/09

As the programme develops further we will do more work on other areas of emissions such as water consumption, waste and possibly staff commute.

Planned projects

The table below lists five projects that will be implemented in the first year of the programme. An investment of approximately £198,000 will be made in order to save 262 tonnes of CO₂. To achieve our target we will need to cut in total 1,349 tonnes CO₂. Further projects have been identified and they are estimated to deliver a total of 1213 tonnes of CO₂. The remaining 136 tonnes will be delivered throughout the 5-year period, as we continue to identify and implement new projects.

Ref	Project	Lead officer	Cost	Payback period (years)	CO ₂ savings tonnes	% of target	Project Start Year
OF9	Office improvements - Voltage Optimisation for the main council office	Steve Holt	£23,000	4.5	34	2.2%	2009
OF11	Office improvements - Thin client computers roll out programme –year 1. (Replace 100 PC's every year, for 3 years)	Martin Wilson	£20,000	5.5	25	1.6%	2009
OF16	Office Improvements - Boiler replacement at the main council office	Steve Holt	£70,000	11	35	2.2%	2009
LC9	Leisure Centres – CHP	Kelvin	£35,000	2.7	95	6%	2010

	reinstatement at Cranleigh	Mills					
LC14	Leisure Centres – Boiler replacement at Farnham	Kelvin Mills	£50,000	3.9	73	4.6%	2010
TOTAL			198k		262	16.6%*	

Finance

The carbon management programme supports Waverley’s corporate priorities to deliver value for money as well as reducing CO₂ emissions. The financial benefits from implementing a Carbon Management Plan are going to be significant as energy prices are predicted to rise over the years. Waverley will continually look for external sources of funding to supplement the costs of projects.

Taking into account potential fuel and energy cost increases in the years to come, we have estimated the cost of inaction is likely to be significant. Figure 2 below demonstrates the “Business as Usual” scenario against the emissions reduction scenario.

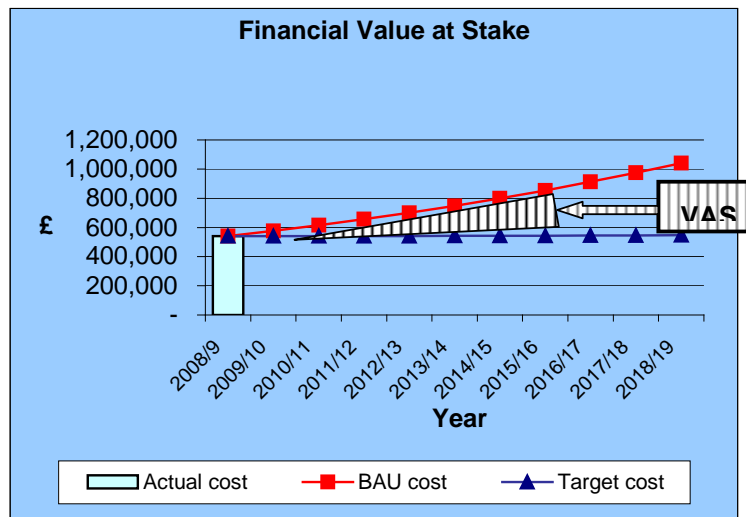


Figure 2. Financial Value at Stake

The difference between the two scenarios, over the next years, is the Value at Stake (VAS) and demonstrates the cumulative potential cost avoidance.

The energy cost forecast is based on energy costs in 2009 and assumptions from central government.

A reduction in CO₂ emissions of 25% by April 2015 could avoid increases in cost of up to £1.05m

Management Reporting Evaluation

Good programme management is key to making Carbon Management effective in Waverley. This will be achieved by recognising carbon management as a corporate priority and by each service taking ownership of their contribution to the reduction targets.

* In order to achieve the target this figure would have to equate to 100%

Project Sponsor and Project Lead will meet at least once a month and will review progress on target. The Carbon Management Team will meet every four to six weeks. The Carbon Management Board will meet quarterly and will overlook the progress of the projects.

The progress on the Carbon Management Plan will be formally reported annually to Corporate Management Team and the appropriate committees. The progress of the individual projects will be reviewed every six months.

1 Introduction

Waverley has signed up to the Carbon Trust's Local Authority Carbon Management Programme (LACM). Through the programme, the Carbon Trust provides councils with technical and change management guidance and mentoring that helps to identify practical carbon and cost savings.

The Programme is designed to lead Waverley through a systematic analysis of its emissions and help produce a robust Carbon Management Plan (CMP). The primary focus of the CMP is to reduce emissions under the control of the local authority, such as buildings, vehicle fleets, car park lighting. It will also assist with achieving reductions under the National Indicator 185 (NI185).

The journey of developing a CMP, within an organisation, follows the proven success of the five steps below:

Step 1 – Mobilise the organisation

Building the team and determining the scope

Step 2 – Set baseline, forecast and targets

Setting the baseline for the programme and its goals

Step 3 – Identify and quantify options

Identifying the risks and opportunities

Step 4 – Finalise strategy and implement plan

Designing a cost-effective strategy to cut emissions

Step 5 – Implement the plan

Complete with budgets, targets and success metrics

It has been estimated that by April 2015 the cost of consuming as we are at the moment will be in the region of **£1.05m**. We must achieve the target of **25% reduction by April 2015** if we are to keep energy cost at the same level as now. If we achieve more, the financial benefits will be greater. This represents a potential cost avoidance in future years.

A number of energy-saving projects have already taken place including the boiler replacement at The Burys; the installation of solar thermal panels for preheating our hot water; the refurbishment of two leisure centres in Waverley that will improve the efficiency and therefore reduce emissions.

It is important to us that we set the example to the community and do what we can to encourage emission reductions in the Waverley area as a whole. As a landlord, Waverley has been carrying out a range of energy efficiency measures over several years to help reduce fuel consumption and costs to tenants and address the climate change agenda. For the purposes of this programme we are not taking into account those measure, as they do not affect Waverley Council's direct emissions.

2 Carbon Management Strategy

2.1 Context and drivers for Carbon Management

The evidence that the activities of humankind are having an intense effect on our climate is now overwhelming. Avoiding the most serious consequences of climate change will require all of us to make changes to how we live our lives. Waverley acknowledges that the climate is changing and recognizes this is a major challenge. Waverley also recognizes that it has a responsibility to demonstrate leadership in tackling climate change.

2.1.1 National Drivers

Legislation

The UK Government has placed an emphasis on local authorities setting a leading example on Climate Change. Action by local authorities will be critical to the achievement of the Government's climate change objectives, such as the long-term goal to reduce CO₂ emissions by 80% by 2050 in the draft Climate Change Bill. This target was increased from 60% soon after the formation of the Department of Energy and Climate Change in October 2008.

National Indicators

NI185 – percentage CO₂ reduction from LA operations: Measurement against this indicator requires each local authority to calculate its CO₂ emissions from analysis of the energy and fuel use in their relevant buildings and transport, including where these services have been outsourced.²

NI186 – per capita CO₂ emissions in the LA area: Local authorities are uniquely placed to provide vision and leadership to local communities by raising awareness and to influence behaviour change. The percentage reduction in CO₂ per capita in each LA will be reported annually. This will be produced by Central Government.

Display Energy Certificates - As of 1 October 2008 there is a legal requirement for all public sector buildings to show a Display Energy Certificate (DEC) in a prominent place, clearly visible to the public.³ The main Council offices and the leisure centres hold a DEC that are renewed annually to demonstrate improvements in energy consumption.

Carbon Reduction Commitment (CRC): The Carbon Reduction Commitment is a mandatory "cap & trade" emissions trading scheme for organisations whose total electricity consumption is greater than 6,000MWh or approximately £500k. From 2010 poorly performing Local Authorities will be penalised depending on their position in a CRC league table⁴.

As it stands at the moment Waverley does not qualify for CRC but it is vital that we are prepared for any changes in the criteria.

² more information on NI185 and NI186 can be found at:
http://www.decc.gov.uk/en/content/cms/what_we_do/lc_uk/loc_reg_dev/ni185_186/ni185_186.aspx

³ more information on DEC can be found at
www.communities.gov.uk/planningandbuilding/theenvironment/energyperformance/certificates/displayenergycertificates

⁴ more info on the CRC can be found at: <http://www.defra.gov.uk/Environment/climatechange/uk/business/crc/index.htm>

2.1.2 Regional Drivers

Local Area Agreement (LAA) 2008-2011 – The Surrey LAAs were agreed with the Government Office for South East (GOSE). Amongst the priorities, NI 186 (Per Capita reduction in CO₂ emissions in the LA area) aims to reduce community CO₂ emissions by 10% by 2011.

Surrey Sustainable Community Strategy – In 2008 the Waverley Strategic Partnership, and the Waverley Borough Council Executive identified that the themes and priorities of the Surrey Sustainable Community Strategy (SCS) accurately reflected key issues in our area and adopted these as the basis of the Waverley SCS. Climate Change is one of those areas.

2.1.3 Local Drivers

Corporate priorities – Waverley is committed to protect and enhance the environment and ensure that we contribute to tackling Climate Change. By reducing the energy we consume we are reducing cost. Providing value for money to our customers is another corporate priority that we strive to achieve.

Energy prices - Energy and fuel costs have seen a dramatic rise in recent years, with energy prices increasing by well over 50% since 2004. This trend is not expected to change and we must accept that the price we pay for our energy will continue to increase in the coming years.

Community leadership – We have a duty to be a community leader. We are in a key position to lead on efforts to reduce CO₂ emissions by setting an example to the private sector as well as the communities that we serve.

2.2 Our low carbon vision

***Making Waverley a Low Carbon Authority.
Lead by example***

2.3 Strategic areas of focus

In order to deliver and implement Carbon Management we have identified a number of strategic themes that will be followed.

1. **Embed carbon management into our corporate priorities** – corporate plan, procurement, consider carbon impact on any decision made, appraisal targets.
2. **Improve data management** - monitor energy and fuel consumption accurately and effectively – continually improve data monitoring.
3. **Increase energy efficiency of all our buildings** – continually investigate energy efficiency and renewable energy options.
4. **Encourage sustainable transport** – provide low emission transport options to employees.
5. **Communication** – establish a formal communication action plan with awareness raising campaigns and training.
6. **Evaluation** – establish a monitoring and reporting process to report progress bi-annually.

2.4 Targets and objectives

Waverley has a crucial role in tackling climate change as community leader and service provider. The final carbon reduction saving target reflects the Council's role as community leader.

Waverley will reduce CO₂ emissions from Council operations
(from 2008/09 levels)
25% by April 2015 and 34% by April 2020

3 Emissions Baseline and Projections

3.1 Scope

The first complete set of data for buildings and transport emissions for Waverley were collected for financial year 2008/2009. This data was initially gathered as part of reporting the new National Indicator NI185, introduced last year. As advised by DEFRA, the first reporting year was financial year 2008/09. For consistency purposes, we will be using this year as the baseline year and compare any reductions against those figures.

The following sources of emissions have been monitored and data was collected.

- Council buildings - including offices, leisure centres, car park lighting, pavilions, sheltered housing units and day centres.
- Transport of our contractors – this includes our biggest contractors: waste collection, housing maintenance, grounds maintenance as well as a number of smaller contractors.
- Business Mileage – mileage done by officers.

As the programme develops further we are keen to start looking into other areas of emissions, such as waste from the main offices, water consumption and possibly staff commute.

3.2 Baseline

The CO₂ emissions for Waverley's buildings and operations in 2008/09 were **5,397 tonnes**. The figures below illustrate a breakdown of those emissions.

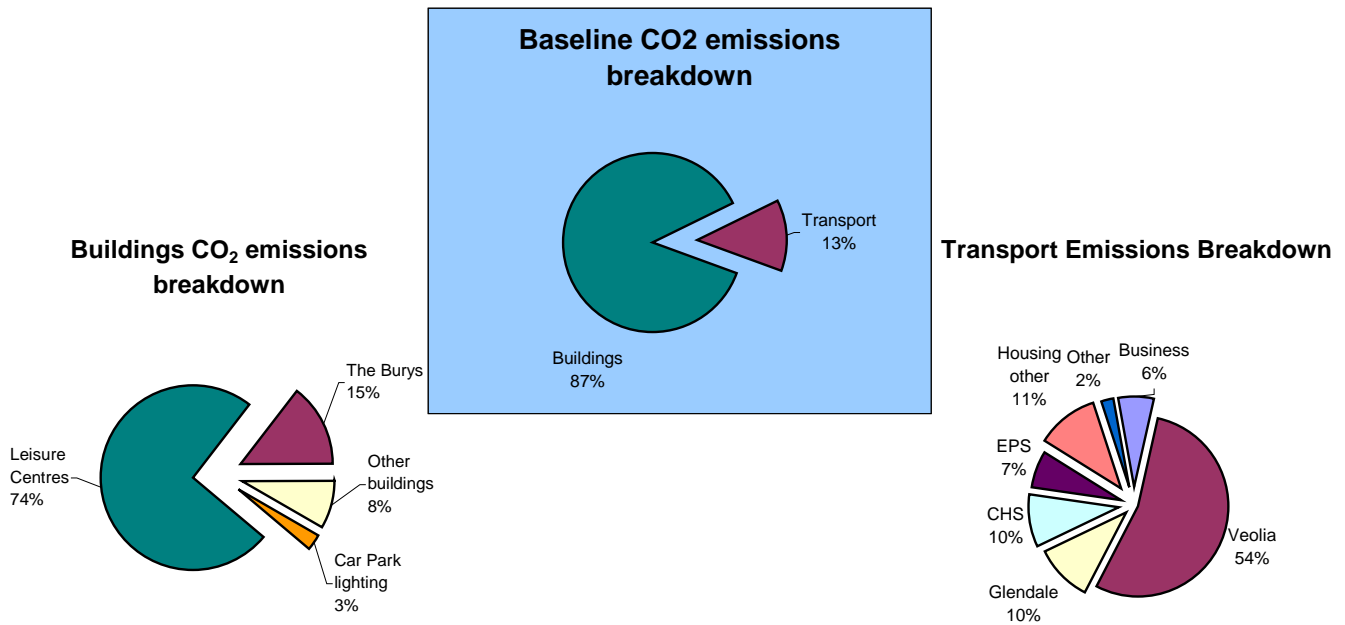


Figure 3.1 Summary of emissions for baseline year 2008/09

Waverley outsources most of its operations and so mileage from contractors accounts for a significant proportion of its transport deriving CO₂ emissions. The largest contractor that operates in Waverley is the recycling and refuse contractor. The nature of this service is such that vast amounts of fuel are consumed for just operating the machinery onboard the vehicles. In addition, the number of miles being done on a daily basis is also quite high as the borough is very rural and properties are spread over a large geographical area. However we are working closely with them to establish more efficient ways of carrying out the service.

The largest proportion of the CO₂ emissions from the buildings comes from Waverley's five leisure centres followed by the main council office at The Burys in Godalming. This analysis of the consumption proportions will assist with prioritising projects. Focusing on the areas that have higher consumption will justify invest to save projects that will result in CO₂ reductions and also financial savings in the long run from reduced energy bills.

3.3 Projections and Value at Stake

An indication of the potential cost and CO₂ savings that can be achieved by implementing a strong CMP is outlined in this section where we are looking at projections of emissions and costs using two scenarios.

3.3.1 The first scenario is Business-as-Usual (BaU), where consumption continues as before, without achieving any reductions. This scenario is based on the assumption that there will be:

- Increase in Demand for all stationary sources of 0.7% (source DTI/DBERR EP68)
- Increase in demand for Fleet of 0.7% (source DTI/DBERR EP68)
- Increase in cost of vehicle fuel of 5.3% (source DECC,2009, Communication on DECC Fossil Fuel Assumptions)

3.3.2 The second scenario is implementing a CMP and achieving an approximate CO₂ reduction of 5.6% year on year. Both scenarios are measured against consumption during 2008/09.

The difference between the two scenarios is the Value at Stake (VAS). This is expressed in terms of energy costs in figure 3.2 below. The energy cost forecast is based on a number of assumptions from central government on fuel and energy price increases in the years to come. This cost includes utilities and fuel for transport. For Waverley, reducing carbon emissions by 25% has the potential to result in cumulative energy and fuel cost avoidance of £1.05m by 2014/2015.

The cost of doing nothing is likely to be very significant, especially at a time of great financial difficulty for Waverley.

A reduction on 25% could avoid expenditure on energy and fuel cost by approximately £1.05m by April 2015

The red line indicates the trend of cost if no carbon reduction is achieved. The blue line shows what the cost could be if a 25% reduction in CO₂ and energy is achieved. Table 3 expresses the potential cost avoidance year on year by April 2015.

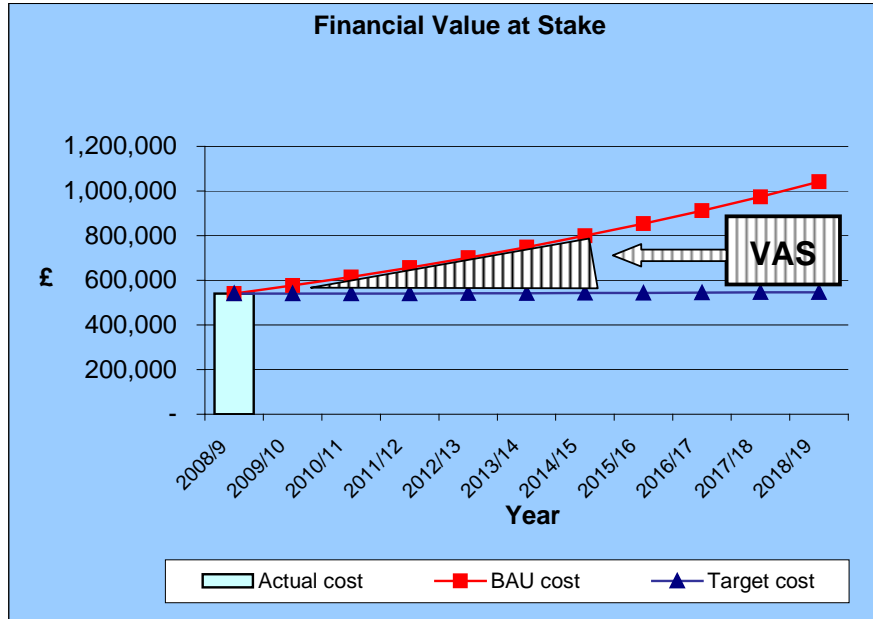


Figure 3.2 Financial Value at Stake from inaction

Year	Potential cost avoidance ⁵	Cumulative
2009/10	£ 46,750	£ 46,750
2010/11	£ 96,529	£ 143,279
2011/12	£ 149,554	£ 292,833
2012/13	£ 206,058	£ 498,891
2013/14	£ 266,291	£ 765,182
2014/15	£ 288,626	£ 1,053,808

Table 3. Potential cost avoidance by April 2015

⁵ Figures include projected electricity and gas cost for buildings as well as vehicle fuel cost for business mileage and contractors. In reality some of these costs are incorporated into total cost of contracts.

4 Carbon Management Projects

A number of projects have been explored that will help towards the CO₂ reductions that Waverley has committed to deliver. Having in mind where the majority of our emissions come from we have identified short-term projects that will deliver some “quick wins” towards the target. Payback times will play a significant role in prioritisation projects, as value for money is a priority for Waverley.

4.1 Progress so far

Energy efficiency is not a new practice for Waverley. A number of projects have taken place in the last few years.

Amongst those are:

- Server virtualisation – we are reducing the number of servers that support out IT systems.
- Light sensor in toilets – Lights in all toilets are automatically turned off within a few minutes of inactivity.
- Purchase of one pool car – A pool car was recently launched and will reduce the business mileage done by officers in non efficient vehicles.
- Solar thermal panel for hot water – The hot water at The Burys is preheated by solar thermal panels.
- Leisure centres refurbishment – A number of energy efficiency measures will be completed, as part of the Farnham and Cranleigh leisure centre refurbishment.
- Wood fuel boiler in Farnham Park lodge – The total heat demand of the office and a domestic accommodation is now delivered from the biomass boiler.
- Number of housing energy efficiency projects in Waverley’s housing stock, such as insulation and double glazing – however these projects will not be considered for the purposes of this programme.

4.2 Existing projects

The projects outlined below have been quantified and funding is available for their implementation. They account for approximately 17% of the Waverley’s total reduction target in the first year of implementation. They will continue to contribute this amount every year thereafter.

Ref	Project	Lead officer	Cost	Payback period (years)	CO ₂ savings tonnes	% of target	Project Start Year
OF9	Office improvements - Voltage Optimisation for the main council office	Steve Holt	£23,000	4.5	34	2.2%	2009

OF11	Office improvements - Thin client computers roll out programme –year 1. (Replace 100 PC's every year, for 3 years)	Martin Wilson	£20,000	5.5	25	1.6%	2009
OF16	Office Improvements - Boiler replacement at the main council office	Steve Holt	£70,000	11	35	2.2%	2009
LC9	Leisure Centres – CHP reinstatement at Cranleigh	Kelvin Mills	£35,000	2.7	95	6%	2010
LC14	Leisure Centres – Boiler replacement at Farnham	Kelvin Mills	£50,000	3.9	73	4.6%	2010
TOTAL			198k		262	16.6%*	

Table 4.1 Top projects underway

* In order to achieve the target this figure would have to equate to 100%

4.3 Potential future projects

During the programme a number of possible projects have been identified that will reduce energy consumption and save money. Those projects will deliver carbon savings of 1,213 tonnes out of the total of 1,349 tonnes. The remaining 136 tonnes of CO₂ can be delivered throughout the 5-year period, as we continue to identify and implement new projects. Each project will be assessed in the next few years and will be quantified in more detail to demonstrate their viability before it is decided whether they will be going ahead. Once feasibility studies are complete, appropriate funding will be allocated accordingly.

Table 4.2 outlines some of the potential projects. At this stage it is not possible to have an accurate details on cost, payback and CO₂ savings. Most detail provided below is based on the Carbon Trust's rule of thumb guidelines.

Ref	Project	Lead officer	Cost	Payback period (years)	CO ₂ savings (tonnes)	% of target	Project Start Year
OF21	Office improvements – server virtualisation	Roger Standing	£157,000 ⁶	-	20	1.2	2009
OF12 OF13	Office improvements - Thin client computers roll out programme –year 2 and 3.	Martin Wilson	£40,000	5.5	50	3.6	2009
OF19	Office Improvements – HWS controls	Steve Holt	£1,000	1	5	0.3	2010
LC 1	Replace Godalming Leisure Centre ⁷	Kelvin Mills		-	46 - 91	2.9 – 5.8	2011
LC 5	Liquid pool covers at Cranleigh	Kelvin Mills	£2,400	0.8	31	2	2011

⁶ Includes unavoidable cost of life cycle maintenance and replacement of servers

⁷ Reduction is based on a preliminary assessment of between 15-30% reduction in energy use.

LC 6	Variable speed drives at Cranleigh	Kelvin Mills	£5,000	1.3	24	1.6	2010
LC15	Liquid pool covers at Farnham	Kelvin Mills	£2,400	0.8	30	2	2011
LC24	BMS control system upgrade at Farnham	Kelvin Mills	£60,000	-	11	0.7	2010
LC29	Liquid pool covers at the Herons	Kelvin Mills	£3,000	0.8	39	2.5	2011
LC30	Replacement of pool Air Handling Units (AHU) at the Herons	Kelvin Mills	£6,500	1.9	22	1.4	2010
LC31	Replacement of other AHU at the Herons	Kelvin Mills	£11,000	0.8	95	6	2011
CP1	Car park lighting - Cut down operation times by 5h	Paul Frame	£0	-	29	1.8	tbc
CP4	Car park lighting – Replace bulbs with 30% more efficient ones	Paul Frame	£4000	2.2	12	0.8	tbc
TR5	Transport – Waste contract:: drivers training	Rob Anderton	£10,000	-	22	1.4	2011
TR8	Transport – Waste contract:: implement low carbon vehicles for refuse and recycling collections	Rob Anderton	Currently unknown	-	174	11.1	2012
TOTAL			302k		610	39.3%*	

Table 4.2 Possible future projects

* In order to achieve the target this figure would have to equate to 100%

Figure 4.1 below outlines the prospective progress against the target. The purple line indicated how close to the target line (blue line) we are if all the projects identified during this programme were to be implemented. As projects get closer to implementation the more confident the likelihood of CO₂ and cost savings becomes.

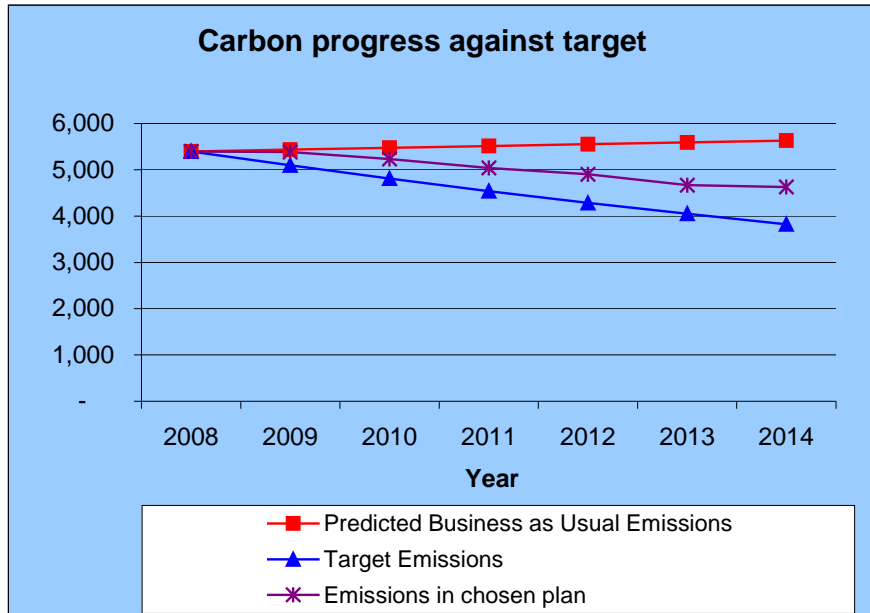


Figure 4.1 Progress against target

4.4 Assumptions

Most of the projects outlined in this section have been quantified based on the assumptions below.

Energy cost based on 2009 prices
Electricity unit price is 8p/kWh
Gas unit price is 3.2p/kWh

Accuracy and Feasibility

For certain projects it was not possible to obtain accurate saving figures at this stage and for this reason the Carbon Trust’s “rule of thumb for quantifying carbon savings” guidance has been used.

The potential projects listed above are subject to more detailed analysis to verify their viability. As the programme evolves and more projects are added they will undergo the same process to justify the cost and CO₂ benefits.

5 Carbon Management Plan Financing

The process of the carbon management programme is in alignment with Waverleys corporate priorities to deliver value for money as well as reducing CO₂ emissions. The financial benefits from implementing a Carbon Management Plan are going to be significant. Energy prices are predicted to rise over the long term, although short-term prices can be volatile.

Waverley funds most of its core capital projects from its own revenue. Whilst this is a limited amount each year due to council tax constraints, the Council has developed a prioritisation methodology which covers a number of criteria including any ongoing revenue costs or savings, deliverability, the extent to which the proposed scheme meets the Council's priorities and the environmental credentials of the project. Invest to save projects are encouraged and supported, particularly where the payback is short. Good examples recently have been improvements to the Councils offices and council houses where utility cost savings have been quickly achieved.

A capital monitoring group, which involves the Chief Executive and leading Councillors, oversees the evaluation process and then keeps a close eye on the delivery of project during the year. If schemes fall behind, generate savings or are no longer necessary, this group quickly responds to bring new schemes forward during the year. Wherever possible, the Council seeks to utilise external funding towards capital from grants, partnership contributions or planning infrastructure tariffs.

5.1 Quantified benefits

Table 5.1 below summarises the potential savings that Waverley may achieve by implementing all the projects identified.

	Existing Projects (Table 4.1)	Potential Future Projects (Table 4.2)	Remaining potential projects	Total
Estimated implementation cost	£198,000	£302,000 ⁸	£615,000 ⁹	£1,115,000
Potential annual cost saving	£40,000	£148,960	£50,873	£239,833
Estimated annual CO₂ saving (tonnes)	262	610	341	1,213
% of CO₂ target achieved	16.6%	39.3%	22.8%	78.7%

Table 5.1 Quantification of existing and potential projects

⁸ Figure excludes costs of some major projects. Those costs will be covered through the Capital Programme.

⁹ Figure is based on estimated cost for the majority of the remaining projects. Some projects have not been fully quantified.

5.2 Non financial benefits

Apart from the financial benefits that this programme is going to bring there are some other non-financial advantages.

- Improve services by operating as efficiently as possible.
- Meet monitoring requirements for new National Indicator NI 185
- Improve our reputation with the public and demonstrate community leadership
- Increase carbon management awareness amongst staff and contractors.
- Create evidence to support good performance under Key Line Of Enquiry

5.3 Other sources of funding

Waverley will continually look for external sources of funding as they become available to supplement the costs of projects.

Waverley employs a grants officer who seeks to identify sources of funding to support capital projects, often in partnership with community organisations. The Council uses 'GrantFinder' software to help match funding to potential uses. Waverley also tries, wherever possible, to utilise planning infrastructure contributions from developers to fund schemes that would not otherwise have been delivered. These projects would be evaluated in the standard way described above.

It is the Council's policy to use prudential borrowing only where there is a clear revenue stream or benefit arising from the capital project. The new Godalming leisure center project is an excellent example where the borrowing costs will be largely offset by improved revenue and reduced running costs. The largest estimated cost saving is energy use due to the significant improvements that will be delivered in the construction and fit-out of the new building and its facilities. Where borrowing is used, the Council does this directly from the Public Works Loans Board as it is able to secure beneficial rates and flexible repayment options.

6 Actions to Embed Carbon Management in Your Organisation

One of the aims of the Programme is to embed carbon management practises into Waverley's processes. It is recognised that in order to “*make Waverley a low carbon authority*”, a lot of change will have to take place in our existing practices and policies. The Carbon Management Embedding Matrix attached, as [Appendix A](#) is a tool that shows to what extent those practises are embedded into our operations.

6.1 Corporate Strategy – embedding CO₂ saving across your organisation

Embedding carbon management into an organisation requires senior endorsement and commitment to the targets that has been set. In Waverley, the Corporate Management Team (CMT) has demonstrated this commitment by formally approving participation to the Carbon Management Programme.

Embedding Carbon Management:

- Revised the Corporate Priorities to include Carbon Management
- Incorporated carbon targets in all Service Plans
- Included carbon reduction consideration in all new job descriptions
- Included considerations to carbon implications for all projects considered for capital investment by the Council.
- Continually inform staff on carbon reduction activities.

6.2 Programme Management – bringing it all together effectively

Good programme management is key to making Carbon Management effective in Waverley. This element of embedding Carbon Management is covered in more detail in section 7 of this Plan.

6.3 Responsibility – being clear that saving CO₂ is everyone's job

Recognising that carbon management is everyone's responsibility is key to success. Officers at all levels should have a role to play. In order to achieve this all staff need to be clear as to what is required or expected of them.

The draft Service Plans for 2010/11 includes targets relevant to NI185 and NI186. Heads of Service will be responsible for delegating relevant carbon responsibilities to their teams. A carbon management statement will be included in all new job descriptions. This statement acknowledges that all staff have a responsibility to contribute towards the Councils target to reduce carbon emissions from own operations.

The “Green Advocates” is group of volunteers from the various departments that act as champions and help encourage behavioural change. They have been in existence since 2007 and have worked on a number of small projects. They will be used to implement the communication plan.

6.4 Data Management – measuring the difference, measuring the benefit

As part of reporting for NI185 we now have a system in place for collating energy data from buildings and transport from business mileage and contractors. This is done annually for the NI requirements. Data quality checks are undertaken regularly to ensure accurate data gathering.

The five leisure centres and the main council office in Godalming are now half-hourly metered. These together account for 60% of Waverley's carbon footprint. The installation of an energy display in the main office reception is helping communicate actual consumption to the public and to staff.

Water consumption is currently monitored half hourly and waste is being weighted since February 2010.

6.5 Communication and Training – ensuring everyone is aware

Effective communication is key to changing behaviour and the "low carbon" culture change. A number of communication activities take place regularly. A communications action plan has been developed to assist with systematic communication of achievement and aspirations to staff and the external community. The communication methods that will be used include Green Advocates group, intranet and email, events and Waverley publications.

An energy saving checklist is included in the staff induction pack already but it will be reviewed during 2010 to include new messages. Messages tailored to specific groups of staff will also be investigated.

Sustainability pages have been created on the Waverley intranet site and provide a dedicated place where staff can look at energy consumption of the office, green travel options and progress on the Green Advocates plan. The Carbon Management Programme also features on the internal website.

6.6 Finance and Investment – the money to match the commitment

All projects will be considered on an individual basis and carbon reduction merits will be examined closely. Value for money is a priority for Waverley so funds will be allocated to invest-to-save projects as a priority.

This aspect of embedding Carbon Management is covered in section 5 of this Plan.

6.7 Policy Alignment – saving CO₂ across your operations

The Carbon Management Team has looked at how to bring existing policies in line with carbon management. In early 2010 a process will be developed to include carbon reduction aspects in all policy reviews. A checklist will cover all the cross section aspects of the council's priorities.

Specific carbon implications will be included in the Committee reports to generate more thought about the impact of decisions.

Carbon scoring will be included in the bidding process for the capital programme. “Invest to save” options are taking priority over other projects and most energy efficiency projects have strong “invest to save” characteristics.

6.8 Engagement of Schools – influencing Schools to reduce their carbon footprint

Schools do not fall directly under Waverley’s remit though the LA does work with schools on an ad hoc basis. The council will continue to offer this kind of support when appropriate.

6.9 Engagement of your Suppliers – working with suppliers to reduce your carbon footprint

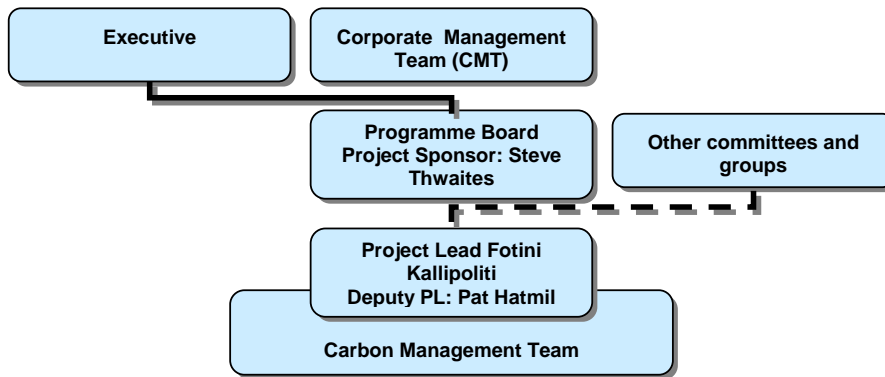
Waverley outsources a great number of its services and recognises the importance of liaising with contractors. The relevant officers will communicate Waverley’s carbon reduction aspirations to major contractors in quarterly meetings. Under NI185 requirements we have requested all contractors to supply us with transport data on a regular basis.

Waverley is in the process of incorporating sustainable aspects to its procurement policies. The appointment of a procurement officer will give this area the attention that is needed. During 2010 negotiations will commence for the renewal of the waste and recycling collection contract. Carbon reduction requirements will be incorporated to reflect the Councils level of commitment to tackling climate change.

7 Programme Management of the CM Programme

To succeed in carbon management it is important to demonstrate leadership at the highest level. Good programme governance is key to making carbon management effective in Waverley. This will be achieved by recognising carbon management as a corporate priority and officers taking ownership of the projects and the reduction targets. Identified project owners need to work together to ensure consistent and coordinated carbon reduction activity. Key individuals have been involved in the programme right from the beginning.

A management structure needed to be put into place to ensure high level of commitment and management of the process. This structure is presented below.



7.1 The Programme Board – strategic ownership and oversight

The Carbon Management Board will meet at least once a quarter, soon after the Carbon Management Team meetings. The Project Leaders will meet at least once a month with the Project Sponsor to report progress. The Project Sponsor will report to Corporate Management team quarterly.

The Board will ensure that:

- They set and review strategic direction and targets.
- Monitor progress towards objectives and targets
- Remove obstacles
- Champion plans for financial provision
- Ensure involvement of all functions and services within the organisation

The Programme Board

- Steve Thwaites, Strategic Director
- Cllr John Sandy, Portfolio holder for Environment and Climate Change
- Cllr Mike Band, Portfolio holder for Finance
- Paul Wenham, Deputy Chief Executive
- Fotini Kallipoliti, Sustainability co-ordinator

7.2 The Carbon Management Team – delivering the projects

The Carbon Management Team (CM Team) comprises key officers whose role is to deliver the projects and improvements as and when identified. They will meet every 4-6 weeks and the meetings will be chaired by the Project lead, Fotini Kallipoliti.

Role	Name	Position in the organisation
Project Leader	Fotini Kallipoliti	Sustainability Co-ordinator
Deputy Project Leader	Pat Hatmil	Asset and Info Manager
Carbon Management Team members	Martin Shorten	Head of Environmental Health
	Graeme Clarke	Head of Finance and Performance
	Roger Standing	Head of Customer & Office Services
	Kelvin Mills	Head of Leisure and Youth Services
	John Swanton	Head of Housing
	Julie Jackson	Head of Communications
	Rob Anderton	Head of Environmental Services
	Paul Frame	Head of Building Control, Engineering & Car Parking Manager
	Alex Overington	Head of Human Resources
	Matthew Evans	Head of Planning

7.3 Succession planning for key roles

Maintaining continuity of leadership for an ambitious programme such as this is crucial. For this reason should the key roles of Project Lead and Project Sponsor become vacant the following measures will be put in place.

- Project Sponsor – If the Strategic Director (environment) were to leave the responsibility for the role would pass to the Deputy Chief Executive or another director until a new director is appointed.

- Project Lead – If the Project Lead were to leave the responsibility for this role will be shared between Deputy Project Lead and the Sustainability Assistant until a new Sustainability co-ordinator is appointed.
- Project Board – If either of the two Councillors that sit in the Board were to leave, they will be replaced with the new appointed portfolio holders for environment and finance.
- Carbon Management Team - If any members of the team were to leave will appoint a successor until a new employee is appointed.

7.4 Annual progress review

The progress on the CMP will be formally reported annually to:

- Corporate Management Team
- Any appropriate committees

It will cover financial savings, CO₂ savings against our target, and less quantifiable benefits (such as influencing the local community supporting NI186).

Progress with projects will be formally monitored by the Project Lead and reported twice yearly to the CM Team and Board. If any issues arise, they will be escalated by the CMTeam to the Board in the interim.

Appendix A: Carbon Management Matrix - Embedding

	CORPORATE STRATEGY	PROGRAMME MANAGEMENT	RESPONSIBILITY	DATA MANAGEMENT	COMMUNICATION & TRAINING	FINANCE & INVESTMENT	POLICY ALIGNMENT *	ENGAGEMENT OF SCHOOLS
5 BEST	<ul style="list-style-type: none"> Top level target allocated across organisation CO₂ reduction targets in Directorates Business Plans Action plans in place to embed strategy. Progress routinely reviewed 	<ul style="list-style-type: none"> Cabinet / SMT review progress against targets on quarterly basis Regular diagnostic reports provided to Directorates Progress against target published externally 	<ul style="list-style-type: none"> CM integrated in responsibilities of senior managers CM part of all contracts / T&Cs Central CO₂ reduction advice available Green Champions leading local action groups 	<ul style="list-style-type: none"> Regular collation of CO₂ emissions for all sources Data externally verified Monitoring & Targeting in place for: <ul style="list-style-type: none"> buildings street lighting transport/travel 	<ul style="list-style-type: none"> All staff given formalised CO₂: <ul style="list-style-type: none"> induction and training communications Joint CM communications with key partners Staff awareness tested through surveys 	<ul style="list-style-type: none"> Finance committed for 2+ yrs of Programme External funding being routinely obtained Ring-fenced fund for carbon reduction initiatives 	<ul style="list-style-type: none"> CO₂ friendly operating procedure in place Central team provide advice and review, when requested Barriers to CO₂ reduction routinely considered and removed 	<ul style="list-style-type: none"> A 'whole school approach' including curriculum Mature programme of engagement in place CO₂ saving in schools having a wider community impact
4	<ul style="list-style-type: none"> CO₂ reduction commitment in Corporate Strategy Top level targets set for CO₂ reduction Climate Change Strategy reviewed annually 	<ul style="list-style-type: none"> Sponsor reviews progress and removes blockages through regular Programme Boards Progress against targets routinely reported to Senior Mgt Team 	<ul style="list-style-type: none"> CM integrated in to responsibilities of department heads Cabinet / SMT regularly updated Staff engaged through Green Champion network 	<ul style="list-style-type: none"> Annual collation of CO₂ emissions for: <ul style="list-style-type: none"> buildings street lighting transport/travel Data internally reviewed 	<ul style="list-style-type: none"> All staff given CO₂ reduction: <ul style="list-style-type: none"> induction communications CM matters communicated to external community 	<ul style="list-style-type: none"> Coordinated financing for CO₂ reduction projects via Programme Board Funding principles and processes agreed Finances committed 1yr ahead Some external financing 	<ul style="list-style-type: none"> Comprehensive review of policies complete Lower level policies reviewed locally Unpopular changes being considered 	<ul style="list-style-type: none"> A clear emphasis on energy / CO₂ reduction in schools Council activities fully coordinated Broad set of education stakeholders engaged Funding in place
3	<ul style="list-style-type: none"> CO₂ reduction vision clearly stated and published Climate Change Strategy endorsed by Cabinet and publicised with staff 	<ul style="list-style-type: none"> Core team regularly review CM progress: <ul style="list-style-type: none"> actions profile & targets new opportunities 	<ul style="list-style-type: none"> An individual provides full time focus for CO₂ reduction Key individuals have accountability for carbon reduction Senior Sponsor actively engaged 	<ul style="list-style-type: none"> Collation of CO₂ emissions for limited scope i.e. buildings only 	<ul style="list-style-type: none"> Environmental / energy group(s) given ad hoc: <ul style="list-style-type: none"> training communications 	<ul style="list-style-type: none"> A view of the cost of CO₂ reduction is developing, but finance remains ad-hoc Some centralised resource allocated Finance representation on CM Team 	<ul style="list-style-type: none"> All high level and some mid level policies reviewed, irregularly Substantial changes made, showing CO₂ savings 	<ul style="list-style-type: none"> A person has responsibility for Schools CO₂ reduction Schools CO₂ reduction projects coordinated Ad-hoc funding
2	<ul style="list-style-type: none"> Draft Climate Change Policy Climate Change references in other strategies 	<ul style="list-style-type: none"> Ad hoc reviews of CM actions progress 	<ul style="list-style-type: none"> CO₂ reduction a part-time responsibility of a few department champions 	<ul style="list-style-type: none"> No CO₂ emissions data compiled Energy data compiled on a regular basis 	<ul style="list-style-type: none"> Regular awareness campaigns Staff given CM information on ad-hoc basis 	<ul style="list-style-type: none"> Ad hoc financing for CO₂ reduction projects 	<ul style="list-style-type: none"> Partial review of key, high level policies Some financial quick wins made 	<ul style="list-style-type: none"> Ad-hoc schools projects to specifically reduce energy / CO₂
1 Worst	<ul style="list-style-type: none"> No policy No Climate Change reference 	<ul style="list-style-type: none"> No CM monitoring 	<ul style="list-style-type: none"> No recognised CO₂ reduction responsibility 	<ul style="list-style-type: none"> No CO₂ emissions data compiled Estimated billing 	<ul style="list-style-type: none"> No communication or training 	<ul style="list-style-type: none"> No specific funding for CO₂ reduction projects 	<ul style="list-style-type: none"> No alignment of policies for CO₂ reduction 	<ul style="list-style-type: none"> No CO₂ / energy reduction policy for schools

* Major operational policies and procedures, e.g. Capital Projects, Through Life Costing, Procurement, HR, Business Travel

