

South Derbyshire

*At the Heart
of The National Forest*

HOUSING SERVICES

ENERGY EFFICIENCY STRATEGY

Project Release Date: March 2005

Revised May 2005

A. Introduction

i. Purpose of Strategy – The purpose of this Housing Services Energy Efficiency Strategy is to support South Derbyshire District Council's commitment to environmental sustainability and the well being of its community. This strategy will ultimately be incorporated into a corporate strategy to tackle these commitments on a council-wide basis.

The Energy Efficiency Strategy provides a framework for the implementation of a series of measures, which are designed not only to meet with the Council's corporate commitment to reducing carbon emissions but to improve the energy efficiency of South Derbyshire's housing stock and provide a means of support for the Council's Housing Customers, particularly the vulnerable, for the purposes of eradicating Fuel Poverty.

The Strategy is made up of a Policy Statement from which a series of aims and objectives have been established and incorporated into an Action Plan. It is also an integral part of the Asset Management Strategy and seeks to ensure that the housing stock will be progressively improved through a 'Best Value' framework that includes external grant funding to deliver affordable warmth to Housing Customers in their homes and meet a high standard of thermal and energy efficiency by 2010.

ii. Legal Context - The *Kyoto Protocol* was established in December 1997 to gain greater commitment from world governments to stabilise '*greenhouse gas*' concentrations in the atmosphere at a level that would not interfere with the world's climate systems. This Protocol requires the United Kingdom to cut greenhouse gas emissions by 12.5% on 1990 levels by the year 2010.

The *Home Energy Conservation Act 1995 (HECA)* was introduced by the Government to tackle *climate change* and set a series of targets for Local Authorities to reduce greenhouse gas emissions, particularly Carbon based emissions (CO and CO₂) by 30% before 2007. HECA requires amongst its objectives, the minimising of consumption of energy such as natural gas and electricity in the home.

HECA also requires every UK local authority with housing responsibilities to prepare, publish and submit measures to improve the energy efficiency of all residential accommodation in their area including their own housing stock. This includes the

development and implementation of an 'Energy Efficiency Strategy' for the housing stock that they maintain.

The Government's 'Fuel Poverty Strategy' published in 2001 was produced as part of the Warm Homes and Energy Conservation Act 2000. This act set targets for reducing fuel poverty for the most vulnerable households by 2010. Its primary aim is to ensure that no 'vulnerable households' (defined as an older householder, a family with children and a householder who is disabled or who has long term illness) need risk ill health due to a cold home.

Both HECA and the Fuel Poverty Strategy aspire to similar overall aims in as much as by improving energy efficiency in the home, there will be a reduction in energy consumption, carbon emissions and a lower associated cost of heating homes, thereby providing 'Affordable Warmth' to the occupants.

These ambitions were integrated as a component part of the 'Decent Homes' standard. The standard maintains that a property is only decent if it "provides a reasonable degree of thermal comfort". The criterion is judged by assessing the type of heating in a property together with the type of roof and wall insulation.

iii. The Community Strategy - South Derbyshire District Council's Draft Community Strategy, supported through the Corporate Plan 2004 -2007, sets out its vision for the community in 6 Key Themes. They are: -

- Safe communities
- **Healthy communities**
- A vibrant economy
- **A sustainable environment**
- Lifelong learning and culture
- Creating opportunities for all

Of these, 2 themes backed up with corporate aims over the next 5 years, represent the corporate focus of this Energy Efficiency Strategy. The Community Strategy aspires to: -

Healthy Communities through -

- Achieving good health wherever you live, whatever your circumstances
- Making sure there is support for vulnerable people where and when it is needed

- Ensuring all homes in the district (especially those occupied by vulnerable households) meet the 'Decent Homes Standard'

and

A Sustainable Environment through –

- Achieving a cleaner environment through the engagement of local communities
- Meeting the need for quality, affordable homes
- Reducing energy consumption

By improving energy efficiency within South Derbyshire's Housing stock, the Council can reduce energy consumption and associated costs for the more vulnerable in the community, promote better health, realise a cleaner environment and help in delivering affordable homes that conform to the 'Decent Homes Standard' by 2010.

iv. The benefits of an Energy Efficiency Strategy - There are a whole range of reasons why improving the efficiency of housing stock will benefit our Housing Customers, the Council and the environment. They include:-

For Housing Customers

- Reducing the cost of annual heating and lighting bills
- Maintaining a warmer and healthier home environment during winter months with less risk of condensation or mould
- Living and working in a more pleasant healthier outdoor environment
- Contributing to the longer term welfare of generations to come

For The Council

- Improved asset value of the housing stock
- Lower annual maintenance costs
- Higher levels of customer satisfaction and less complaints
- Improved reputation as a quality housing provider
- Helping to meet air quality targets as part of its Air Quality Strategy

For the Environment

- Lower levels of air pollution which contribute to 'climate change'
- Less greenhouse gases through reduced Carbon emissions
- Reduced use of natural gas and other Fossil Fuel resources

v. Delivering Energy Efficiency measures - The areas where Housing Services can make improvements to energy efficiency in its homes include:

- The fitting of energy efficient condensing boilers and controllable heating systems to the housing stock
- Increasing the level of insulation in lofts and cavity walls to improve SAP ratings
- The installation of thermally efficient windows, doors and roof systems
- The installation of draught proofing measures
- Ensuring that its operational staff and contractors can identify, advise customers and carry out their work to achieve the best methods of saving energy and improving thermal efficiency in homes
- Ensuring that Customer Services staff can provide accurate and simple advice to housing customers on energy efficiency and its impact upon the environment
- Providing easy access to advice backed up by incentives to encourage housing customers to save energy and reduce their energy bills

These improvement areas combining effective procurement and efficient use of grant funding should provide a sound base for meeting Energy Efficiency targets.

vi. Grant funding - The *Energy White Paper 2003* provides support, encouragement and a financial incentive to local authorities and energy suppliers to develop energy efficiency initiatives and strategies that support the community as a whole. Its four primary aims are:

- To cut the UK's carbon dioxide emissions by 60% by about 2050 with real progress by 2020
- To maintain the reliability of energy supplies
- To promote competitive markets in the UK and beyond, helping to raise the rate of sustainable economic growth and to improve our productivity
- To ensure that every home is adequately and affordably heated.

A number of grant funding initiatives have been established as a consequence of this paper:

- The Government's *Energy Efficiency Commitment (EEC)*. The EEC is a statutory obligation on energy suppliers to deliver energy efficiency

improvements in housing. It is administered by energy companies under a range of schemes and coordinated through the Eaga Partnership to provide grants to improve heating systems and energy efficiency for social housing stock in partnership with Housing Associations and Local Authority housing providers.

- *Warm Front*' (formally the Home Energy Efficiency Scheme [HEES]) which was the main source of funding for many years ceased to apply to social housing in 2001. This scheme now tackles fuel poverty among vulnerable households in the private, rented and owner occupied sectors. The scheme provides grants for packages of insulation and heating improvements, including central heating systems, for eligible households. The scheme continues to be promoted by the Government and mainly administered through local authority departments with environmental responsibilities.
- Amongst other 'supplier specific' funding, Transco's *'Affordable Warmth Programme'* is an initiative, driven by EEC targets, that has introduced Affordable Warmth leases. These make it attractive for Local Authorities and RSL's to undertake the installation of highly efficient gas central heating and energy efficiency measures.
- There are also a wide range of sources available that allow access to funding, this includes European, lottery, government and charitable trust funds suitable for energy efficiency in housing projects. Many of the funding agencies require projects to be innovative and original before they will support them. This can often require considerable time and effort in preparation work.

vii. Maximising grant funding for housing stock improvements – Accessing funding is often challenging, as the competition for grants is considerable. The amount of success in gaining grant funding will depend upon the resources, in terms of time and expertise that are made available in the preparation of a bid.

Funding agencies need to be confident that their funds will deliver results in line with their own funding criteria. As such the Council will have to be specific on its aims and clear in terms of the outcomes of the proposal and when they are to delivered. Successful bids tend to be innovative, involve partners and community interests and promote sustainable regeneration.

Some funding agencies will often provide support for bidders to tailor their proposals along the lines of their requirements. However, the Council should be alert to the timescales of delivery for funds that can vary considerably between agencies (up to 18 months) and can create budgetary difficulties if not factored correctly into the Council's financial planning. It is sensible to run any ideas past the funders early on to make sure a lot of time and effort is spent on a proposal that they are never going to be interested in.

The EAGA Partnership is a charitable trust that manages programs on behalf of central government, the devolved administrations, utilities and social housing providers as well as private customers. Current programs include the delivery of energy efficiency, central heating and income maximisation through Benefit Entitlement Checks.

EAGA should provide the initial advice and support for Housing Services to establish some clear guidelines for accessing future grant funding and to quantify what internal resources would be needed by the department to achieve these aims. This first stage initiative has consequently been factored into the Action Plan of this strategy.

viii. Progress on private sector environmental initiatives - South Derbyshire District Council intends to introduce an Environmental Management System and hopes to achieve EMAS accreditation in the medium term. Improving energy efficiency in the Local Authority Housing Stock will be a key element in the programme of improvements identified and pursued by that System.

Complementary to its overall environmental ambitions, the Council has recently signed up to the *'Nottingham declaration'*. This commits the Council along with other Local authorities to a reduction in carbon emissions in line with the UK Climate Change Programme (which exceeds the 'Kyoto Protocol' targets).

Efforts to deliver this will be coordinated through a Carbon Management Strategy, to be produced by The Head of Environmental Services, which will identify and allocate corporate priorities to carbon reduction measures. The Housing Services Energy Efficiency Strategy will be one of a small number of Key Plans that will contribute to the delivery of the Carbon Management Strategy.

A further key contributor to the Carbon Management Strategy will be the Private Sector Housing Affordable Warmth Strategy.

At a practical level the Council's Environmental Services Department currently promote the 'Warm Front' scheme as part of its Private Sector Housing Renewal Strategy. The department draws in EEC money into the area, with Powergen, via the 'HeatStreets' scheme and Enact Energy's Heat Initiative, to deliver a range of grant funding aimed at eliminating of fuel poverty and improving the energy efficiency in private housing.

The Private Sector Housing team is also working towards establishing partnerships with local PCT's and Social Services to allow Home Helps and District Nurses to identify households in Fuel Poverty as part of a Health Referral Network.

ix. Delivering Affordable Warmth to Housing Customers – the delivery of Affordable Warmth into South Derbyshire's Housing Customers will depend upon the Councils ability to quantify and deliver a programme of energy efficiency measures through external grant funding using the best advice and support available. Affordable warmth is perceived as the solution to fuel poverty. It is defined by the Building Research Establishment (BRE) as:

"The ability to achieve sufficient warmth for health and comfort within 10% or less of the household income".

All income groups can benefit by improved insulation and heating systems to reduce heating costs, thus making the heating of their home more affordable, but the low income groups usually have a greater concern for energy efficiency as a means of attaining adequate warmth. It is usually the low-income groups that suffer 'fuel poverty'.

The BRE definition is now the most frequently used benchmark for Affordable Warmth. However it can be impractical to determine group improvement programmes based solely upon household income. Difficulties often arise due to changing personal circumstances relating to income, or the occupancy of dwellings. It would therefore require a constant review of householder income to determine and maintain the Repair and Improvement Programme based upon this information. It may also be almost impossible to provide affordable warmth on the sole basis of income, in a dwelling that is 'under occupied' (i.e. a pensioner living alone in a three bedroom semi-detached property)

It is therefore generally accepted that the target for public sector dwellings should be based upon typical house types using property data such as *Energy Ratings* e.g. SAP ratings and an evaluation of notional benefit or income levels based upon full occupancy.

B. Policy Framework

i. Policy Statement -

'It is the policy of South Derbyshire Housing Services to provide its housing customers with energy efficient homes that are decent, eradicate Fuel Poverty and provide Affordable Warmth whilst minimising the effect upon the environment'

ii. Aims

In support of this policy, Housing Services have established the following 7 aims for the period 2005 - 2010.

1. To support the aims of the Draft Community Strategy in achieving Healthy Communities and a Sustainable Environment
2. To provide a coordinated approach within Housing Services to develop, implement and maintain an Energy Efficiency Strategy that will deliver Affordable Warmth to housing customers
3. To improve the energy efficiency of all Housing Stock to meet the 'Decent Homes Standard' by 2010
4. To strive to eradicate Fuel Poverty in all vulnerable Council maintained households through advice and education
5. To raise awareness and encourage all Housing Customers to be energy efficient within their homes
6. To use innovative and cost effective practical methods (including the use of emerging technology) to reduce the emissions of carbon and atmospheric pollution from heating systems and to maintain high thermally efficient standards in Council homes
7. To maximise external grant funding for Energy Efficiency Schemes to deliver Best Value for South Derbyshire's Housing Customers

The Action Plan in Section D of this strategy sets out the means by which these aims will be achieved over the next 5 years

iii. Review and Consultation

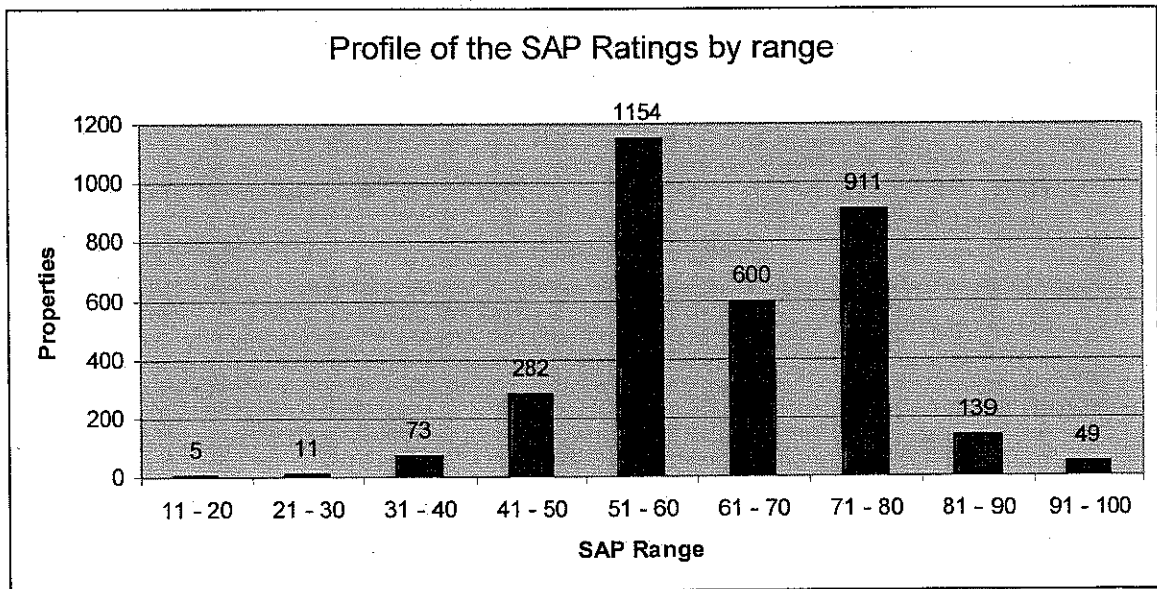
The Policy, Aims and Objectives of this strategy should be reviewed annually in conjunction with the Asset Management Strategy. During the review, the following organisations should be considered for inclusion as part of the consultation process.

- The Energy Savings Trust
- The proposed Corporate Environmental Working Group
- Neighbouring Local Authorities and RSL's and 'Nottingham Declaration' partner authorities
- Local strategic Partnership
- Tenant's Forum (TACT)
- South Derbyshire's PCT and Social Services
- The EAGA Partnership and Energy Suppliers
- Insulation and heating contractors and partners
- Manufacturers and Suppliers of energy efficient products

C. Current Energy Efficiency Stock Profile and Future Targets

i. Energy Efficiency Assessment - The following chart is a profile of South Derbyshire's Housing Stock and represents the current average energy efficiency rating (SAP) of all Council maintained homes within the district.

The chart has been prepared from data that has been compiled on the Council's 'Lifespan' software programme.



ii. Energy Efficiency Targets

The following chart represents the average SAP Ratings of properties in each group of parishes and the annual targets for improvement towards a target of 70 by 2010

The data has been broken down into parish boundaries and is designed to be read in conjunction with the Repairs and Improvement Plan.

Parish Areas	Current Average SAP Rating	Target SAP Rating by March of:				
		2006	2007	2008	2009	2010
Church Gresley, Castle Gresley, Melbourne & Eastern Parishes	66.3	67.1	67.8	68.5	69.3	70
Hartshorne, Woodville & Lower Midway	60.7	62.5	64.4	66.3	68.1	70
North Eastern Parishes & Newhall	64.0	65.2	66.4	67.6	68.8	70
Southern Parishes & North Western Parishes	63.6	64.9	66.2	67.4	68.7	70
Swadlincote & Upper Midway	62.9	64.3	65.7	67.2	68.6	70
Whole Stock	63.6	64.9	66.1	67.4	68.7	70

D. Housing Services Energy Efficiency Action Plan

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
<p>ONE:</p> <p>To support the aims of the Community Strategy in achieving Healthy Communities and a Sustainable Environment</p>	<p>A Establish Housing Services as member of Corporate Environmental Working Group to deliver the aims of the Draft Community Strategy and to ensure that through corporate working and consultation, Housing Services maintain an effective Energy Efficiency Strategy</p>	<p>i. Delegation of representatives from Housing Services to sit on corporate group and to have full departmental responsibilities for coordinating energy efficiency and environmental improvements to housing stock.</p> <p>ii. Housing Services representatives to ensure Corporate Environmental aims remain aligned to Housing Energy Efficiency aims</p>	<p>30/06/05</p> <p>Ongoing</p>	<p>B Ledger</p> <p>Delegate</p>
<p>TWO:</p> <p>To provide a coordinated approach within Housing Services to develop, implement and maintain an Energy Efficiency Strategy that will deliver Affordable Warmth to housing customers</p>	<p>A Establish an Energy Efficiency Monitoring Team to oversee and deliver the aims of Housing Service's Energy Efficiency Strategy</p>	<p>i. Form a team (including at least one service expert) to comprise of Repairs and Improvement Manager, Improvement Manager, Repairs Manager and delegated officer from operations. Other personnel with specific interests to be invited at the team's discretion</p> <p>ii. Establish terms of reference for Energy Efficiency Monitoring Team</p> <p>iii. Review and amend Energy Efficiency Strategy annually against legal and corporate aims</p> <p>iv. Consult, seek approval and publicise aims of strategy in conjunction with corporate policy</p>	<p>30/06/05</p> <p>30/06/05</p> <p>31/03/06 and annually</p> <p>Ongoing</p>	<p>L Carter</p> <p>L Carter</p> <p>EEM Team</p> <p>EEM Team</p>

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
TWO: Cont'dB	Identify financial and specialist resources for delivering Energy Efficiency over a 5 year Programme	<ul style="list-style-type: none"> i. Identify staffing and specialist advice needed to achieve aims of Energy Efficiency Strategy ii. Examine internal financial resources needed to meet with aims of the Energy Efficiency Strategy 	31/08/05	G Clarkson
THREE: To improve the energy efficiency of all Housing Stock to meet the 'Decent Homes Standard' by 2010	<ul style="list-style-type: none"> A Re-evaluate and maintain Energy Efficiency stock data to provide accurate reflection on stock energy ratings B Carry out energy efficiency improvements to housing stock as part of Repairs and Improvement programme 	<ul style="list-style-type: none"> i. Validate, through site visits and research, data held on 'Lifespan' software system ii. Produce an updated stock profile as part of Energy Efficiency Strategy on 6 monthly 	31/8/05 then ongoing	G Clarkson
		<ul style="list-style-type: none"> i. Identify and Prioritise potential areas for Energy Efficiency Improvements inc. Loft and Cavity insulation, Central Heating upgrades, Solid Fuel to Gas Fuel Switching, Replacement, Window and Door replacement, Draught Proofing etc. 	30/06/05 and annually	L Carter
		<ul style="list-style-type: none"> ii. Undertake consultation with tenant group (TACT) on proposals to introduce energy efficiency measures 	31/08/05 and ongoing	D Dawson
		<ul style="list-style-type: none"> iii. Incorporate post consultation improvement proposals into Repairs and Improvement programme through quantifying internal and external grant funding for schemes against annual income streams 	01/02/06	G Clarkson

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
		iv. Prepare specifications using Best Value to deliver tendered or negotiated schemes on time and on budget whilst maximising external grant funding v. Review progress of improvement areas against Repairs and Improvement targets and report to tenants annually on progress	31/03/06 and ongoing Ongoing	G Clarkson L Carter/ D Dawson
FOUR: To strive to eradicate Fuel Poverty in all vulnerable Council maintained households by 2010 through advice and education	A Identify and provide support for Housing Customers in potentially Fuel Poor circumstances	i. Prepare a desktop model and profile of annual stock heating costs against notional benefit levels to establish the affordable warmth needs of Housing Customers ii. Prepare a procedure to monitor affordable warmth levels in tenancies and target information and practical advice to assist Housing Customers to effectively manage Energy Efficiency within their homes	30/11/05 31/12/05	G Clarkson G Clarkson
FIVE: To raise awareness and encourage all Housing Customers to be energy efficient within their homes	A Ensure Housing Staff and contractors can provide advice and apply practical measures when in homes to improve Energy Efficiency	i. Prepare a training programme for Housing call handling staff and those engaged in operational duties to provide energy efficiency measures and advice when dealing with customers or when working in homes ii. Consult and encourage contractors who undertake work for Housing Services to train their staff to deliver best practice energy efficient measures when working in homes	31/08/05 21/12/05	B Ledger L Carter

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
	B Actively promote energy efficiency in Council homes	<p>i. Establish independently or in collaboration with other authorities or agencies a Freephone and Internet link to customers to access practical advice on Energy Efficiency measures</p> <p>ii. Prepare using advice from the Energy Savings Trust an advisory booklet on Energy Efficiency that is distributed to Housing Customers and included in New Tenant Starter Packs</p> <p>iii. Prepare regular features on Energy Efficiency measures in the home for inclusion in 'Tenants Extra' newsletter</p>	<p>31/12/05</p> <p>31/12/05</p> <p>30/09/05</p>	<p>Repairs Manager</p> <p>D Dawson</p> <p>D Dawson</p>
<p>SIX: To use innovative and cost effective practical methods (including the use of emerging technology) to reduce the emissions of carbon and atmospheric pollution from heating systems and to maintain high thermally efficient standards in Council homes</p>	A Ensure all central heating systems are designed to incorporate the most cost effective measures to improve thermal efficiency and properties are insulated to minimum standards.	<p>i. Ensure only 'A' rated high efficiency condensing boilers are used in Repairs and Improvement Programme</p> <p>ii. Undertake a review for the upgrade or replacement all solid fuel systems with a view to switching to a more environmentally efficient system of heating</p> <p>iii. Introduce a programme of energy efficiency works to ensure a minimum of 250 mm insulation is installed into all loft areas that receive insulation work and that all hot water pipes and tanks are lagged where they are exposed</p>	<p>31/03/06</p> <p>30/06/05</p> <p>30/06/05 and ongoing</p>	<p>G Clarkson</p> <p>L Carter</p> <p>G Clarkson</p>

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
		iv. Ensure that cavity wall insulation is included as a standard feature of all new and refurbished homes.	30/06/05 and ongoing	G Clarkson
	B Introduce improvements to the Energy Efficiency of homes through the use of new technological advances where appropriate (Including Combined Heat and Power, Solar Photovoltaic and Solar Heating panels etc.)	i. Undertake an annual review of heating and power generation technologies against cost benefits and where appropriate include in Repair and Improvement programme. ii. Undertake a review of funding or financial incentives for introducing new technologies to establish any potential benefits for trailing or wholesale inclusion in future energy planning	31/03/06 and ongoing	EEM Team
			31/03/06 and annually	EEM Team
SEVEN: Maximise external grant funding for Energy Efficiency Schemes to deliver Best Value for South Derbyshire's Housing Customers	A Identify, programme and access external grant funding for the delivery of the Energy Efficiency Strategy	i. Set up meeting with funding agencies (Initially the EGA Partnership) and make contact with suppliers to establish grant funding potential based upon current social make up of tenants and current stock Energy ratings ii. Quantify funding requirements and establish internal resource needs in terms of skills and finance to deliver a fund bidding programme	13/05/05	G Clarkson
			30/09/05	G Clarkson
	Energy Efficiency Strategy – Housing Services 2005		17	

Aim	Key Objective	How objective to be achieved	Timescale	Lead Officer Responsible
		iii. Integrate external grant funding potential with internal financial framework and incorporate into Repairs and Improvement Programme. Modify programme regularly against actual funding streams	01/02/06 and annually	L Carter

E. Measuring Performance

The Energy Efficiency Monitoring Team will meet at least annually to review the performance of the Energy Efficiency Strategy against the corporate environmental aims of the Council and the Repairs and Improvement Programme energy efficiency targets using the following methods.

i. KPI's – These will include

- Number of dwellings that have been subject to energy survey
- Number of dwellings that have achieved targeted SAP rating by parish area
- Lowest and highest average SAP rating per parish area
- Average and highest CO2 emissions from housing stock in each parish area
- Number of properties with minimum 250mm loft insulation and pipe insulation
- Number of properties with full cavity wall insulation
- Number of properties that have central heating systems that comply with the Decent Homes Standard
- Proportion of external grant funding by category against internally maintained budgets for Energy Efficiency Improvements
- Number of Identified Housing Customers who are categorised as Fuel Poor

ii. Action Plan Reviews - To be undertaken a minimum of 4 times per annum

iii. Benchmarking - To be arranged through contact with EST and other similar Local Authorities with housing responsibilities to establish a series of high level KPI's that can be compared and discussed between participants for the purposes of establishing best practice.

F. Glossary of Terms

Affordable Warmth - The ability to heat a person's home to achieve sufficient warmth for comfort within 10% or less of the household income and without incurring excessive fuel bills or developing a debt as a result.

Climate Change - A change of climate that is attributed directly or indirectly to human activity that alters the composition of the global atmosphere and which is in addition to natural variations in climate.

Decent Homes Standard - In 2000, the government made a commitment to bring all public sector homes up to a decent standard, establishing a ten-year target and an interim target to: "ensure that all social housing meets set standards of decency by 2010, by reducing the number of households living in social housing that does not meet these standards by a third between 2000 and 2004, with most of the improvements taking place in the most deprived local authority areas".

Energy Efficiency Commitment (EEC) - An obligation placed on gas and electricity supply companies as a condition of their license. EEC places targets for energy savings to be achieved (by energy supply companies) in domestic residences. This means the supply companies deliver schemes to encourage take up of insulation and efficient electrical items. Schemes are delivered by the company itself or in partnership with other organisations or local authorities. 70 per cent of the energy savings achieved under EEC must be in vulnerable households.

Energy Efficiency Strategy - A document that is a framework for delivering a series of measures, which are designed to reduce the consumption of energy through use of innovative, practical technologies, raising awareness and understanding to conserve natural resources, minimise greenhouse gas emissions and eradicate Fuel Poverty.

Energy Ratings - An energy rating is a measure of the energy efficiency of a dwelling under standard occupancy conditions. It is designed to help compare the energy efficiency of different homes on a common basis, much like the mileage per gallon figures used to compare the energy efficiency of cars. See Standard Assessment Procedure (SAP)

Energy White Paper 2003 - The Government's strategy for energy policy combining environmental, security of supply, social and competitiveness goals.

Fossil fuels

Any Hydrocarbon deposit that can be burned for heat or power purposes, such as coal, oil or natural gas. Fossil fuels are formed from the decomposition of ancient animal and plant remains (eg coal, natural gas and fuels derived from petroleum).

Fuel poverty - A fuel poor household is one that needs to spend more than 10 per cent of its income on all fuel use to heat its home to an adequate standard of warmth

Greenhouse Gases - Molecules in the Earth's atmosphere such as carbon dioxide, methane and CFC's that warm the atmosphere because they absorb some of the thermal radiation emitted from the earth's surface.

Housing stock profile - A graphical representation of the numbers of properties in a housing stock with different levels of energy efficiency. Stock profiles provide an immediate visual indication of overall performance.

HECA - The Home Energy Conservation Act was introduced in 1995 to tackle the problems of fuel poverty and climate change by focusing local authorities' attention on improving the energy efficiency of all homes. It puts a duty on energy conservation authorities to draw up strategies to improve energy efficiency in all housing and to report on the progress made in implementing them.

Kyoto Protocol - The Kyoto Protocol is an international agreement setting targets for industrialised countries to cut their greenhouse gas emissions. These gases are considered at least partly responsible for global warming - the rise in global temperature which may have catastrophic consequences for life on Earth. The protocol was agreed in 1997, based on principles set out in a framework convention signed at the Rio Summit in June 1992.

Renewable Energy - Energy production using natural resources in an inexhaustible manner.

Standard Assessment Procedure (SAP) - The SAP energy rating is a unit that compares the energy efficiency of homes on the same basis regardless of their location in the country. It is based on the estimated annual cost of heating and hot water per square metre and is expressed on a scale of 0 to 120 (with 120 being the highest). Note - The Government propose to change the SAP ratings calculation method and revert to a scale of 1 to 100 from 1st January 2006 with the introduction of SAP2005.

