# **Energy Performance Certificate**

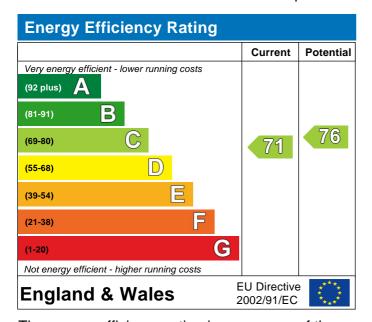


Flat 12 Denbigh House, Denbigh Road NORWICH NR2 3HJ Dwelling type: Top-floor flat
Date of assessment: 23 October 2008
Date of certificate: 23 October 2008

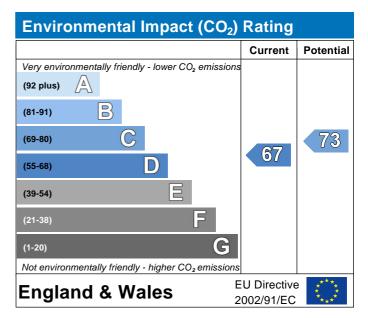
Reference number: 8898-6420-5339-1297-7022

Total floor area: 26 m<sup>2</sup>

This home's performance is rated in terms of energy use per square metre of floor area, energy efficiency based on fuel costs and environmental impact based on carbon dioxide (CO<sub>2</sub>) emissions.



The energy efficiency rating is a measure of the overall efficiency of a home. The higher the rating the more energy efficient the home is and the lower the fuel bills are likely to be.



The environmental impact rating is a measure of a home's impact on the environment in terms of carbon dioxide ( $CO_2$ ) emissions. The higher the rating the less impact it has on the environment.

# Estimated energy use, carbon dioxide (CO<sub>2</sub>) emissions and fuel costs of this home

	Current	Potential
Energy use	404 kWh/m² per year	327 kWh/m² per year
Carbon dioxide emissions	1.8 tonnes per year	1.4 tonnes per year
Lighting	£23 per year	£12 per year
Heating	£269 per year	£231 per year
Hot water	£46 per year	£46 per year

Based on standardised assumptions about occupancy, heating patterns and geographical location, the above table provides an indication of how much it will cost to provide lighting, heating and hot water to this home. The fuel costs only take into account the cost of fuel and not any associated service, maintenance or safety inspection. This certificate has been provided for comparative purposes only and enables one home to be compared with another. Always check the date the certificate was issued, because fuel prices can increase over time and energy saving recommendations will evolve.

To see how this home can achieve its potential rating please see the recommended measures.



The address and energy rating of the dwelling in this EPC may be given to EST to provide information on financial help for improving its energy performance.

For advice on how to take action and to find out about offers available to help make your home more energy efficient, call **0800 512 012** or visit **www.energysavingstrust.org.uk/myhome** 

Flat 12 Denbigh House, Denbigh Road, NORWICH, NR2 3HJ 23 October 2008 RRN: 8898-6420-5339-1297-7022

#### **About this document**

The Energy Performance Certificate for this dwelling was produced following an energy assessment undertaken by a qualified assessor, accredited by Northgate Information Solutions, to a scheme authorised by the Government. This certificate was produced using the RdSAP 2005 assessment methodology and has been produced under the Energy Performance of Buildings (Certificates and Inspections) (England and Wales) Regulations 2007 as amended. A copy of the certificate has been lodged on a national register.

Assessor's accreditation number: NGIS800454
Assessor's name: NGIS800454
Andrew Learmonth

Company name/trading name: Green Energy Matters Ltd

Address: Unit 2, Carlton Drive, Pen-Y-Fan Industrial Estate, Crumlin, Blackwood,

Gwent, NP11 4EA

Phone number: 0845 643 2812 Fax number: 0845 094 5196

E-mail address: customerservices@wfea.co.uk

Related party disclosure:

## If you have a complaint or wish to confirm that the certificate is genuine

Details of the assessor and the relevant accreditation scheme are as above. You can get contact details of the accreditation scheme from their website at http://www.northgate-dea.co.uk/ together with details of their procedures for confirming authenticity of a certificate and for making a complaint.

#### About the building's performance ratings

The ratings on the certificate provide a measure of the building's overall energy efficiency and its environmental impact, calculated in accordance with a national methodology that takes into account factors such as insulation, heating and hot water systems, ventilation and fuels used. The average Energy Efficiency Rating for a dwelling in England and Wales is band E (rating 46).

Not all buildings are used in the same way, so energy ratings use 'standard occupancy' assumptions which may be different from the specific way you use your home. Different methods of calculation are used for homes and for other buildings. Details can be found at www.communities.gov.uk/epbd.

Buildings that are more energy efficient use less energy, save money and help protect the environment. A building with a rating of 100 would cost almost nothing to heat and light and would cause almost no carbon emissions. The potential ratings on the certificate describe how close this building could get to 100 if all the cost effective recommended improvements were implemented.

## About the impact of buildings on the environment

One of the biggest contributors to global warming is carbon dioxide. The way we use energy in buildings causes emissions of carbon. The energy we use for heating, lighting and power in homes produces over a quarter of the UK's carbon dioxide emissions and other buildings produce a further one-sixth.

The average household causes about 6 tonnes of carbon dioxide every year. Adopting the recommendations in this report can reduce and protect the environment. You could reduce emissions even more by switching to renewable energy sources. In addition there are many simple everyday measures that will save money, improve comfort and reduce the impact on the environment. Some examples are given at the end of this report.

#### Visit the Government's website at www.communities.gov.uk/epbd to:

- Find how to confirm the authenticity of an energy performance certificate
- Find how to make a complaint about a certificate or the assessor who produced it
- Learn more about the national register where this certificate has been lodged
- Learn more about energy efficiency and reducing energy consumption

Northgate RdSAP 1.3.0.9 (SAP 9.82)

# Recommended measures to improve this home's energy performance

Flat 12 Denbigh House, Denbigh

Date of certificate: 23 October 2008

Road NORWICH NR2 3HJ Reference number: 8898-6420-5339-1297-7022

# Summary of this home's energy performance related features

The following is an assessment of the key individual elements that have an impact on this home's performace rating. Each element is assessed against the following scale: Very poor / Poor / Average / Good / Very good.

Element	Description	Current performance	
		Energy Efficiency	Environmental
Walls	Cavity wall, as built, no insulation (assumed)	Poor	Poor
Roof	Flat, no insulation	Poor	Poor
Floor	(other premises below)	-	-
Windows	Fully double glazed	Average	Average
Main heating	Boiler and radiators, mains gas	Very good	Very good
Main heating controls	Programmer and room thermostat	Poor	Poor
Secondary heating	None	-	-
Hot water	From main system	Very good	Very good
Lighting	No low energy lighting	Very poor	Very poor
Command an army off:	-1	0.74	

**Current energy efficiency rating** 

C 71

Current environmental impact (CO<sub>2</sub>) rating

D 67

## Low and zero carbon energy sources

None

C 73

#### Recommendations

The measures below are cost effective. The performance ratings after improvement listed below are cumulative, that is they assume the improvements have been installed in the order that they appear in the table.

Lower cost mossures (up to \$500)	Typical savings per year	Performance ratings after improvement	
Lower cost measures (up to £500)		Energy efficiency	Environmental impact
1 Cavity wall insulation	£40	C 75	C 72
2 Low energy lighting for all fixed outlets	£9	C 76	C 73
Total	£49		
Potential energy efficiency rating		C 76	

## Further measures to achieve even higher standards

Potential environmental impact (CO<sub>2</sub>) rating

None

Improvements to the energy efficiency and environmental impact ratings will usually be in step with each other. However, they can sometimes diverge because reduced energy costs are not always accompanied by a reduction in carbon dioxide  $(CO_2)$  emissions.

# About the cost effective measures to improve this home's performance ratings

If you are a tenant, before undertaking any work you should check the terms of your lease and obtain approval from your landlord if the lease either requires it, or makes no express provision for such work.

#### Lower cost measures (typically up to £500 each)

These measures are relatively inexpensive to install and are worth tackling first. Some of them may be installed as DIY projects. DIY is not always straightforward, and sometimes there are health and safety risks, so take advice before carrying out DIY improvements.

#### 1 Cavity wall insulation

Cavity wall insulation, to fill the gap between the inner and outer layers of external walls with an insulating material, reduces heat loss; this will improve levels of comfort, reduce energy use and lower fuel bills. The insulation material is pumped into the gap through small holes that are drilled into the outer walls, and the holes are made good afterwards. As specialist machinery is used to fill the cavity, a professional installation company should carry out this work, and they should carry out a thorough survey before commencing work to ensure that this type of insulation is suitable for this home. They should also provide a guarantee for the work and handle any building control issues. Further information about cavity wall insulation and details of local installers can be obtained from the National Insulation Association (www.nationalinsulationassociation.org.uk).

#### 2 Low energy lighting

Replacement of traditional light bulbs with energy saving recommended ones will reduce lighting costs over the lifetime of the bulb, and they last up to 12 times longer than ordinary light bulbs. Also consider selecting low energy light fittings when redecorating; contact the Lighting Association for your nearest stockist of Domestic Energy Efficient Lighting Scheme fittings.

## About the further measures to achieve even higher standards

Not applicable

# What can I do today?

Actions that will save money and reduce the impact of your home on the environment include:

- Ensure that you understand the dwelling and how its energy systems are intended to work so as to obtain the maximum benefit in terms of reducing energy use and CO<sub>2</sub> emissions.
- Check that your heating system thermostat is not set too high (in a home, 21°C in the living room is suggested) and use the timer to ensure that you only heat the building when necessary.
- Turn off lights when not needed and do not leave appliances on standby. Remember not to leave chargers (e.g. for mobile phones) turned on when you are not using them.
- Close your curtains at night to reduce heat escaping through the windows.
- If you're not filling up the washing machine, tumble dryer or dishwasher, use the half-load or economy programme.