

13th April 2006

Submission by the National Insulation Association to the 2006 UK Energy Review

Executive Summary

This submission to the 2006 Energy Review is from the National Insulation Association which is the definitive voice of the insulation industry serving households. We share the view of the Energy Review that “the best opportunity for reducing the UK’s dependence on gas for heating would seem to rest in energy efficiency”. In the residential sector, the main challenge is to tackle the poor insulation in much of the existing housing stock. In doing so, all the policy goals outlined in the 2003 Energy White Paper can be satisfied in a transparently cost effective fashion.

Despite recent progress, there is much to do in the UK existing housing stock. Even by the end of EEC2 in 2008 there will be over 9 million properties requiring cavity wall insulation and around half the housing stock will have loft insulation levels much inferior to that required in new build.

NIA welcome many of the recent initiatives by the Government but believe there is still much to do to achieve the energy policy goals. These include:

- **increasing the scale of EEC activity from 2008 onwards by at least a factor of 2 over current activity levels**
- **develop a whole house approach in EEC from 2008 such that all the cost effective energy efficiency measures are installed following a survey of the property**
- **revise the Decent Homes definition such that all properties should have a programmable heating system with cavity wall insulation and at least 50 mm of loft insulation**
- **looking longer term, the loft insulation standards for Decent Homes needs to be raised such that all loft insulation should be greater than 100 mm thickness**
- **encourage innovation in EEC through the use of support mechanisms which genuinely reflect the innovation process and do not just focus on technical improvements**
- **continue the work of the Energy Saving Trust and the Climate Change Communication Programme to ensure that householders realise their need to act to reduce carbon dioxide emissions**
- **introduce an Energy Efficiency Commitment for the small business sector from 2008**

- **lead by example and ensure that there are no properties or offices which are owned or used by the Government which are not insulated to the highest standard which is cost effectively possible**

1. Introduction

This submission to the 2006 Energy Review is from the National Insulation Association (NIA). NIA represents the manufacturers and installers of cavity wall, loft insulation and draught proofing, and other innovative solutions for insulation. It is the definitive voice of the insulation industry with respect to household insulation.

This submission has been endorsed by the Council of the NIA on behalf of its members. We have no objection to its contents being made public.

In our response to the questions asked in the Energy Review consultation document, NIA focuses primarily on matters directly of concern to the insulation industry. It sets out some key facts and figures on progress and potential with household insulation as these are important in achieving the Government's energy policy objectives in the residential sector to the period 2020. However, this needs to be approached in a more "holistic" manner than has been the case to date and we outline below our solutions to this longstanding problem. Section 6 deals with the 5 explicit questions posed in the energy review.

2. Energy Policy Goals and Energy Efficiency

NIA are pleased that the original goals of the 2003 Energy White Paper are retained, viz. working through competitive markets to ensure:

- significant carbon dioxide emission reductions by 2020
- maintaining the reliability of energy supplies (energy security)
- energy prices which ensure our international competitiveness
- that every home is adequately and affordably heated

Perhaps, uniquely, energy efficiency can contribute to these key policy goals in a cost effective manner. For example, using less energy will clearly reduce levels of carbon dioxide emissions associated with fossil fuels; it will also require the import of less energy and/or will preserve stocks of indigenous energy longer; finally, it will lower energy bills for all consumers in the UK. While many measures can contribute to these policy goals, only energy efficiency can do so in a way which is transparently cost effective.

It is widely recognised that the "problem energy using sectors" for meeting the policy objective challenges lie in the transport and residential sectors. Most of this paper concentrates on the residential sector and the importance of insulation measures in achieving the UK Government's energy policy objectives.

3. Energy Saving in the Residential Sector

3.1 The Importance of Insulation

In 2003, space heating accounted for 53% of carbon dioxide emissions in the UK.¹ The Government's policy of changing the Building Regulations in April 2005 such that nearly all new boiler installations are energy efficient (condensing) means that the efficiency of generating this space heating will eventually be high (the order of 90%) for GB as a whole. The challenge therefore is to ensure that this efficiently generated heat is not wasted by it simply escaping into the atmosphere through lack of adequate insulation in the existing housing stock.

It is for this reason that over 40% of the Government's projected energy savings for the household sector are expected to come from insulation², such as cavity wall, loft insulation, etc. This corresponds to 4 MtC/annum or 143 MtC over the lifetime of the measures.

Some progress is being achieved in social housing which has much better levels of insulation than the private sector. However, social housing accounts for less than 20% of the UK households. So the major challenge is therefore to raise insulation standards in the private sector especially amongst the dominant owner occupiers (70% of UK housing stock).

The industry is very supportive of the ODPM's proposed amendments to the Building Regulations on energy efficiency for new homes. However, the big challenge is to significantly tackle the real "energy wasters" – the existing housing stock.

3.2 Progress with Insulation to Date

In terms of energy saving from insulation, the most important measures in terms of national energy/carbon saving potential are:

- insulating the cavity walls of properties which are currently empty
- increasing the thickness of existing loft insulation to that required for modern new buildings
- improving the insulation of solid wall properties

Those measures are listed in the order of their cost effectiveness and currently, unless significant other refurbishment work is being carried out at the same time, insulating solid wall properties is not cost effective. Nevertheless, in view of the 7.5 million properties in the UK with solid walls, it is important to address this issue and we believe this is an area where R&D could make a significant contribution. For a minority of households, draught stripping and insulating hot water tanks will remain important money saving opportunities but, viewed on a national scale, they are not of the same magnitude of energy saving importance as those listed above. However, NIA strongly believe that with the "whole house" approach we outline below, such energy saving opportunities would be implemented.

¹ Data from Review of the UK Climate Change Programme 2006 (Defra)

² Household Energy Efficiency : Action for Low Carbon Society, December 2005, Energy Saving Trust

In what follows we focus on cavity wall and loft insulation as being the major energy saving and highly cost effective contributions to the energy policy goals.

To date, the progress with cavity wall insulation has historically been disappointing – by 2005 just over one third of properties with cavity walls had been insulated since the 1970s. Even by the end of EEC2 (2008), we estimate that there will be over 9 million properties requiring cavity wall insulation.

In contrast, loft insulation is present in most UK households albeit at insufficient levels. This was thanks to Government and local authority funded insulation schemes in the late 1970s and 1980s. Consequently there are less than 4% of homes with an accessible loft in the UK which do not have any form of loft insulation. However, even by the end of EEC2 in 2008, there will be around 13 million UK households with 100mm or less insulation in their lofts, i.e. **about half the UK housing stock has loft insulation which is inferior to that required in new build (270-300mm).**

However, as a result of confidence building measures between the Government, energy suppliers and the insulation industry, there has been a marked increase in installation rates as shown in Figure 1. Since the start of EEC, cavity wall insulation installation rates have doubled in four years with a dramatic 46% growth in the last year. Furthermore, the industry already has the capacity to deliver 600,000 cavity wall insulation jobs per annum and the manufacturers are investing in yet further capacity such that the original Energy White Paper goal of 4.5 million cavity walls being insulated between 2005 to 2010 will be achieved.

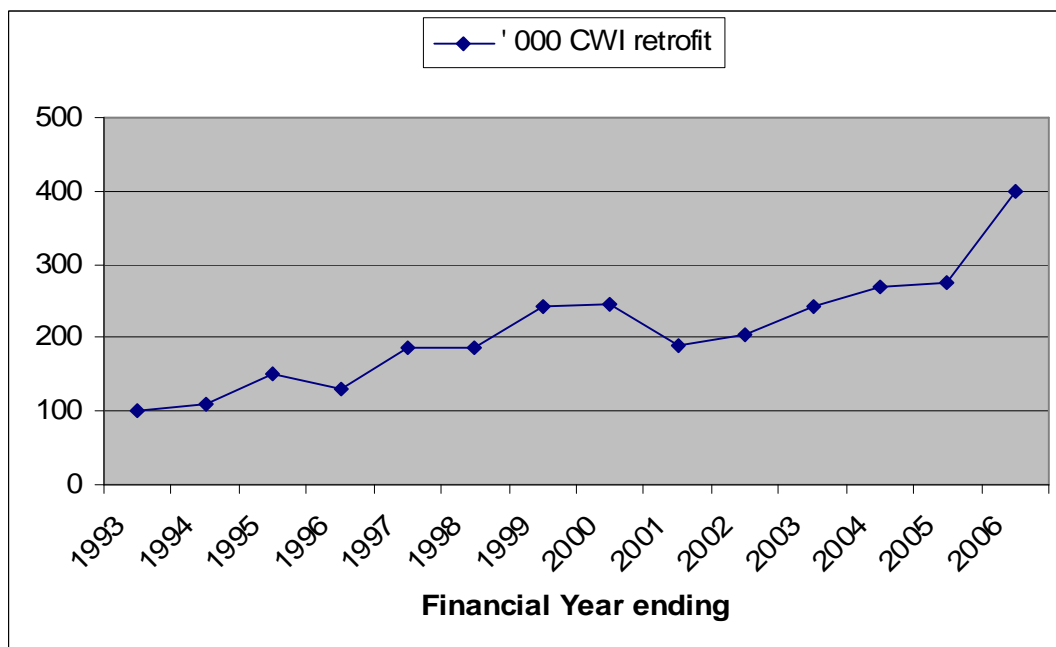


Figure 1. Annual retrofit insulation rates over the period 1993 to 2006 by financial year. Data are averages of Ofgem, EST and insulation industry data.

For loft insulation, the primary activity in recent years in the retrofit market has been fairly stable at around 250,000 jobs per year. As installing loft insulation requires less

training time than for a technician qualified to install cavity wall insulation, then this is an area which can be easily expanded if the market for loft insulation expands.

Consequently NIA believe the statement in the consultation to the Energy Review that “the pace of (energy) efficiency improvements has been slower than needed”, while true of the early part of this decade, is most certainly not true now and we believe the rate of insulation installations can increase considerably further. This is helped by the recent increases in energy prices which have made householders more interested in installing insulation than they have been for a generation.

Consequently, as we expand in the next section in more detail, **NIA believe the Government should be more ambitious in its insulation targets for the rest of this decade and the beginning of the next decade.**

From presentations by the Energy Review team, we have been given the impression that the perception of EEC is that it is an insulation scheme. Nothing could be further from truth. As the evaluation of EEC1 has shown³, of the over 49 million measures installed and carried out in the EEC1 period, only 2.5% related to insulation. However, despite being only 2.5% of the measures installed during the period, the insulation measures accounted for 56% of the energy savings attained in the EEC1 period⁴.

The above figures clearly demonstrate the importance of insulation in making a significant impact upon the energy consumption in the residential sector. As the Consultation to the Energy Review states, “homes in total enjoy the benefits of 44% more light, heat and powered appliances than they did in 1990. Residential emissions however remain broadly the same as they did in 1990 at 40MtC”. Although there has been a 40% improvement in delivering the energy service required by householders, it is important to recognise not all of the potential energy savings are realised in households due primarily to the fact that people make their homes warmer as well as lowering their heating bill – known as comfort taking or the rebound effect.

For insulation, NIA has long been conscious that some of the potential energy savings are taken in the form of increased comfort and this has always been taken into consideration in calculating the carbon savings resulting from EEC. However NIA would point out that at some point in the future, these potential energy savings will materialise.

To amplify this point, NIA note that between 1970 and 2000, BRE estimate that the internal temperatures have risen by 4.2 degrees C. Nevertheless, the average indoor temperatures in UK households are still “cooler” by comparison with our Northern European neighbours. So it is likely that in the short term, the comfort factor will remain significant. However, looking longer term, the comfort factor will diminish as “saturation” effects begin, i.e. the indoor temperatures reach a plateau and rise no further. At that point, the insulation savings will deliver their full potential.

³ Evaluation of the Energy Efficiency Commitment 2002-5:
www.defra.gov.uk/environment/energy/eec/pdf/eec-evaluation-pdf

⁴ It should be noted that there were more than 3 times the number of appliances supported during the EEC1 period than insulation jobs.

In summary, although representing a small number of the measures supported under the various phases of the Energy Efficiency Commitment, insulation remains the most important in terms of energy savings because of its potential to significantly reduce the energy supplied to that household. The industry has expanded and is already putting in place the necessary investment to expand further to deliver the original Energy White Paper target of 4.5 million additional cavity wall insulations between 2005 and 2010. As indoor temperatures in UK households approach those of our continental neighbours, the energy savings from insulation will be significantly greater than those evaluated today.

3.3 What needs to happen to deliver this energy and carbon saving from insulation?
NIA welcomes the recent announcements in the Government's Review of the Climate Change Programme and the Budget which announced significant increase in activity for energy efficiency in the residential sector. In particular, the announcements on a larger EEC3 target, unlimited carry over of energy savings between EEC2 and EEC3 and support for energy suppliers to link energy efficiency investment to Council Tax rebates are positive steps which will increase the pace of energy efficiency improvement in the residential sector. However there are specific issues with the Climate Change Programme which need to be addressed if we are to realise the energy and carbon savings potential of insulation in the residential sector.

3.3.1 Scale of Energy Efficiency Commitment

The Government needs to increase the scale of EEC activity from 2008 by a minimum of a factor of two. The evaluation of EEC1 has shown that the benefits are considerable to consumers – for every pound spent by energy suppliers, customers benefit by £9; in terms of the cost of saving a ton of carbon⁵, the costs are negative (viz -£300), i.e. energy efficiency in EEC1 has resulted in carbon savings with a net benefit rather than cost to the UK.

For these reasons, an expansion of EEC from 2008 by at least a further factor of two is justified.

3.3.2 Whole House Approach and Lost Opportunities in Loft Insulation

There is a need to tackle the concept of “lost opportunities” whereby the 9 million homes in the UK which have exactly 100mm of existing loft insulation are unlikely to be addressed by energy suppliers in the private sector households during the course of EEC2. These 9 million homes in aggregate represent more than half the current EEC2 target and are of such a magnitude that in the long term plan for limiting carbon dioxide emissions from households, this problem will have to be addressed at some point.

This is particularly wasteful if an opportunity to top up loft insulation from 100mm is not taken when that property is having cavity wall insulation installed. NIA estimate that the additional costs going back and rectifying the lost opportunity are in the range £85-130 on top of the measure cost. These costs would ultimately be borne by the energy customers and furthermore there is a real risk that householders

⁵ www.defra.gov.uk/environment/energy/eec/pdf/eec-assessment.pdf

would not bother in the future. Thus carbon savings will either be lost or delayed at greater cost in the long term.

Although the above analysis has focussed on loft insulation as a lost opportunity, the same principle applies to other insulation and other energy efficiency measures as well.

Indeed with the increased deployment of household scale renewables and microgeneration, NIA believe that it is again a fundamental tenet of a sustainable energy strategy that such investments should not take place in properties which are inadequately insulated. We are pleased that the DTI's new Low Carbon building programme website indicates that it will actively encourage such "joined up" thinking between energy efficiency and renewables and we hope this is achieved in practice.

It is therefore essential to begin discussions now about how a whole house approach would be incentivised in EEC3 such that all the cost effective energy efficiency measures are installed as identifying and selling is a significant cost of delivering energy efficiency to households.

3.3.3 Improving the Definition of Decent Homes

The definition for decent homes needs to be tightened. At present, all properties meeting the Decent Home Standard require to have a programmable heating system. While NIA support this initiative, we have always maintained that it is irresponsible both from a tenant's financial perspective and from the environment's perspective to adopt energy efficient heating solutions without the fabric of the building being at least at a reasonable level of insulation.

Currently, the definition for decent homes with oil or gas programmable heating is to have either cavity wall insulation or at least 50mm of loft insulation. As an indication of how wasteful such a definition can be, a three bed semi heated by gas without cavity wall insulation loses over 5,000 kWh per annum or in cash terms over £120 per year at current prices. Similarly, for a house which had cavity wall insulation but no loft insulation, the energy losses would be 7,000 kWh per annum, costing around £170 per annum.

From NIA's experience, the former (i.e. no cavity wall but at least 50mm loft insulation present) is likely to be a more frequent occurrence than the latter. In such cases, not only are householders expected to pay at least an additional £120 a year in fuel bills but over 7 tons of carbon (lifetime corrected for comfort) will be emitted unnecessarily.

Therefore NIA strongly recommend that the Government changes the current definition such that decent homes with gas or oil programmable heating systems should have cavity wall insulation and at least 50mm of loft insulation.

Even with this revised definition, the loft insulation standards are much worse than today's Building Regulations. At some point in the future, the Decent Home Standards needs to be raised such that all loft insulation should be greater than 100mm thickness.

3.3.4 Hard to Treat Homes

In the near future the problem of the “hard to treat properties” needs to be addressed. These generally are of solid wall construction and the existing methods of either internally or externally cladding the property are only cost effective if undertaken at the time of other significant refurbishment. There are over 7.5 million UK dwellings which have solid walls and a significant fraction of those living in fuel poverty live in such properties⁶.

We are pleased that the new Energy Research Centre has as a priority the improvement of insulation effectiveness in solid wall properties. It is important that the results of this research are brought to the market as quickly as possible and NIA believe that the Carbon Trust and Energy Saving Trust have an important role to play in facilitating this.

The next step in the innovation chain would be to use the innovation support mechanism in EEC to assist with early penetration of the innovative solid wall product. This was successfully employed for A-rated appliances in EEC1. However, we are conscious that the narrow definition within EEC of innovation being related solely to technical performance improvements and not to a more generic form of overcoming the barriers to energy efficiency weighs heavily against solid wall insulation. For example, if a new product were developed which had similar technical performance to the existing material but which could lower the cost significantly when in mass production, then this would be an important breakthrough for the solid wall insulation market. However, it would not currently be eligible for innovation support in EEC during its initial market penetration.

Finally in the area of internal cladding, there is a significant DIY market which would benefit from Government or Energy Saving Trust backed endorsement on how to identify good products, how to apply them correctly and to provide independent verification of the potential energy savings.

In summary, NIA believe that the support mechanism in EEC for innovative technologies should genuinely reflect the innovation process and not just focus on technical improvement.

3.3.5 Creating Customer Pull for Energy Efficiency

NIA believe that the recent increase in the price of energy to householders, coupled with the proposed Climate Change Communication Programme of Defra, are likely to generate greater interest in insulation measures in the next few years. However, history has shown that the impact of oil price shocks in the 1970s was gradually forgotten over time.

For this reason, NIA believe that if Government should find in a few years time that insulation measures are stalling, they should either introduce wide scale financial incentives (eg Council Tax or Stamp Duty) or introduce legislation which

⁶ “Insulating Solid Walls – a Challenge for Policy Makers and Scheme Managers”, Energy Efficiency Partnership for Homes, www.est.org.uk/uploads/documents/partnership/Solidwalls_Policy_Final1.pdf

requires a significant improvement in energy efficiency anytime a property is either purchased or rented to a new tenant.

3.3.6 The Private Rented Sector.

We welcome the introduction of further Treasury incentives for the private landlord sector but are conscious that it is too early to say whether such incentives have been successful in stimulating investment by private landlords or not.

The Government therefore needs to review the impact to see whether it is delivering its objectives and, if not, it should introduce a requirement equivalent to the Decent Home Standard that has to be adhered to at the time of letting for private rented properties.

3.3.7 White Certificates

The Government is currently exploring the role that market mechanisms might play in delivering the energy and environmental benefits arising from EEC3 in a way that gives flexibility and stimulates innovation by business. By analogy with the renewable obligation certificates (Green Certificates), the introduction of trading within EEC3 could be classed as White Certificate trading.

In principle it has the possibility of securing the Government's objectives at least cost and could open the energy services' market to new players. However, there are currently only six, possibly soon to be five, main energy suppliers to the residential sector and there would undoubtedly, if the EEC3 activity levels were increased, be interfaces with other energy efficiency policies and trading schemes. Looking longer term (from 2011) NIA could envisage an energy supplier cap and trade scheme but again many details remain to be examined, e.g. impact on fuel poverty.

NIA will play an active role in the ongoing debate on introducing White Certificates into EEC. Looking long term, this could evolve into a supplier cap and trade scheme, but, in the short term there are many issues that have to be addressed and resolved.

3.3.8 Institutional Issues

It is clear that UK and EU energy policies in the future will result in a considerable growth of insulation activity and in some geographical areas this will generate a rapid demand for skilled technicians. This will in turn impact on the demand for training and qualifications and Government should be prepared to work in partnership with the industry to tackle this challenge.

Additionally, it would be helpful to the industry if the "red tape" of other Government Departments did not conflict with the expansion of the insulation industry required to deliver the climate change goals.

4. Insulation and the Non-residential Sector

NIA believes that there is significant opportunity to save energy through insulation measures in the small business sector. NIA were disappointed that the Review of the Climate Change Programme talked about introducing "further measures to take up energy savings opportunity" without specifying exactly what these are intended to

be. From our own experience in the past, NIA believe that a variation of the Energy Efficiency Commitment approach to small businesses would work extremely well. In the first phase of the Energy Efficiency Standards of Performance (the precursor of EEC), energy efficiency obligations on energy suppliers extended to those customers in the business sector with a maximum demand of <100 kW. In EESoP1 which ran from 1994-8 the non-domestic sector accounted for 5% of the total electricity supplier expenditure and 5% of the accredited energy savings⁷. This implies that the national cost effectiveness (i.e. the cost to all parties to save a unit of energy) for the non-domestic sector was the same as the programme as a whole, i.e. 1.7p/kWh. This compared very favourably with the average electricity price for these non-domestic customers of 5.1p/kWh⁸.

In the next phase, EESoP2, there was less activity in the two years that this lasted, primarily because it was clear during the course of EESoP2 that there would not be an ongoing programme for the non-domestic sector. Nevertheless, during EESoP2, there were some 15,600 insulation installations carried out in the non-domestic sector⁹. Furthermore, it was estimated by the Energy Saving Trust at that time that the insulation measures were delivered with a national cost effectiveness of around 0.6 p/kWh, lower than the average national cost effectiveness achieved for EESoP2 of 1.8 p/kWh. As the average price for the relevant non-domestic customers of electricity was 5.5 p/kWh, this once again represented tremendous value.

NIA believe these precedents should be utilised to embark on a new Energy Efficiency Commitment starting in 2008 for small businesses.

5. Government Leading by Example

NIA believe that it is important for Government at all levels, i.e. national, regional and local, to be seen to lead by example. This means that they should ensure that there are no properties or offices which are owned or used by the Government at all levels which are not insulated to the highest standard which is cost effectively possible.

6. NIA Responses to the Key Questions Posed by the 2006 Energy Review

Q.1 What more could the Government do on the demand or supply side for energy to ensure that the UK's long term goal of reducing carbon emissions is met?

In the short and medium term, NIA believe that energy efficiency is the most important and cost effective measure that should be widely implemented while research, development and cost reductions are achieved in the other important technologies and solutions required for a low carbon future. In the residential sector, the single most important activity on this time frame is insulation of the existing housing stock.

⁷ Review of the EESoP Programmes, Ofgem and the Energy Saving Trust, July 2003

⁸ Energy Efficiency Standards of Performance 1994-98, September 1998

⁹ Energy Efficiency Commitment Report 2000-2001, Energy Saving Trust, 2001

The Government's recent announcement on expanding EEC3 from 2008 by a factor of between 1.5 and 2.0 compared to the existing EEC2 is welcome as is the unlimited carry over between EEC2 and EEC3 to avoid the historic problems of start stop which have plagued the insulation industry over the years. The results of 12 years of energy efficiency obligations in the UK have shown that this is a highly cost effective mechanism for reducing energy consumption and carbon dioxide emissions. Over this period, the actual costs of saving a unit of electricity and gas¹⁰ have fallen in real terms with time due to the reduction in costs for the energy efficient technologies with the growing numbers of energy efficient goods sold. NIA believe that EEC2 will continue this trend and that it will remain highly cost effective for the UK to pursue its energy policy goals through expanding energy efficiency in the residential sector. To this end, NIA support at least a doubling of the EEC2 scale of activity in EEC3.

Furthermore NIA believe that the Government should introduce an Energy Efficiency Commitment for small business along the lines of that successfully used by electricity suppliers in the period 1994- 2000 (see Section 4 for more details). The Government should also review the Decent Homes Standards making it mandatory that a decent home should not only just have a programmable heating system but also cavity wall insulation if appropriate. Looking longer term, the Government should revisit the definition of decent homes to bring the levels of loft insulation into line with regulations for new build.

The insulation industry has noted a marked increase in interest in insulation from households as a result of the recent significant price rises for energy to households. However, history has shown (e.g. oil price hikes in the 70s) that after a few years, people adapt to the new level and therefore it is extremely important that the Government's Climate Change Communication Programme highlights the need for action by consumers and how they are not just part of the problem but also a key part of the solution in reducing carbon dioxide emissions.

NIA strongly believe there is a need for more involvement from the Carbon Trust and the Energy Saving Trust in encouraging innovation and helping any ideas coming out of the new Energy Research Centre in tackling solid wall properties. In due course, successful developments should benefit from innovation support within EEC but to attain this, the definition used by Ofgem needs to be widened to reflect the reality of innovation which is not just about technical improvements (see Section 3.3.4 for more details).

Q.2 With the UK becoming a net energy importer and with big investments to be made over the next 20 years in generating capacity and networks, what further steps if any should the Government take to develop our market framework for delivering reliable energy supplies? In particular, we invite views on the implications of increased dependence on gas imports.

We share the Energy Report's view that "the best opportunity for reducing the UK's dependence on gas for heating would seem to rest in energy efficiency". In the

¹⁰ In EEC1, the cost to all parties of saving a unit of energy was 1.3 p/kWh (electricity) and 0.5 p/kWh (gas) compared to average costs to householders of electricity, 6.7 p/kWh and gas, 1.7 p/kWh.

residential sector, the main challenge is to tackle the poor insulation in much of the existing housing stock. Reducing energy usage clearly reduces the need to import energy and conserves our existing indigenous fossil fuel resources.

Q.4 Are there particular considerations that should apply to carbon abatement and other low carbon technologies?

It is extremely important to ensure that in the future the Government designs its activities to ensure a whole house approach to energy efficiency. Costs of marketing, surveying and selling energy efficiency measures to a household are significant and if only one measure is subsequently installed in the property when other measures could have been carried out at the same time, then clearly this is a waste of resources (see Section 3.3.2 for more details).

NIA also believe that it is not sensible for householders or the environment to install energy efficient heating solutions and/or microgeneration or renewable heat sources without minimising the energy demand at the same time through insulation. We hope that the DTI's new Low Carbon Building programme will make this a reality.

Q.5 What further steps should be taken towards meeting the Government's goals for ensuring that every home is adequately and affordably heated?

We welcome the Government's intention to expand WarmFront activity from 2005 but are still concerned that central heating systems are being installed in properties without always ensuring that insulation measures are maximised at the same time. This is particularly important for the fuel poor as without significant reduction in the overall energy use, there is a danger of slipping back into fuel poverty or becoming cold again as energy prices rise.

NIA believe that tackling fuel poverty through WarmFront and its devolved equivalents utilises the correct funding mechanism of general taxation. As the Government's main activities seem to be either expanding the gas network or increasing the number of properties which have central heating, then these are large expenditures per household (several thousands of pounds). NIA believe such large individual expenditure is better funded from taxation rather than by effectively levying all electricity and gas consumers (including poor families) via EEC.

Consequently NIA propose a major expansion of the fuel poverty programme funded through taxation; the scale of expansion should be sufficient to meet the Government's fuel poverty targets. In parallel with this, NIA believe that the next phase of the Energy Efficiency Commitment from 2008 should achieve its social equity considerations in a more realistic fashion than is currently the situation. Currently the priority group (low income) constitutes about 35% of UK households, yet receives more than half the expenditure by energy suppliers. NIA believe that as the programmes expand, this mismatch may constrain activity in the "able to pay sector" and that the social equity issue should be addressed in a way that more closely matches the relative population splits.