

Proposed Domestic Building Environmental Standards (Scotland) Bill

Introduction

A proposal for a Bill to introduce new minimum environmental design standards for all new-build housing to meet the Passivhaus standard or a Scottish equivalent in order to improve energy efficiency and thermal performance.

The consultation runs from 4 May 2022 to 27 July 2022

All those wishing to respond to the consultation are strongly encouraged to enter their responses electronically through this survey. This makes collation of responses much simpler and quicker. However, the option also exists of sending in a separate response (in hard copy or by other electronic means such as e-mail), and details of how to do so are included in the member's consultation document.

Questions marked with an asterisk (*) require an answer.

All responses must include a name and contact details. Names will only be published if you give us permission, and contact details are never published – but we may use them to contact you if there is a query about your response. If you do not include a name and/or contact details, we may have to disregard your response.

Please note that you must complete the survey in order for your response to be accepted. If you don't wish to complete the survey in a single session, you can choose "Save and Continue later" at any point. Whilst you have the option to skip particular questions, you must continue to the end of the survey and press "Submit" to have your response fully recorded.

Please ensure you have read the consultation document before responding to any of the questions that follow. In particular, you should read the information contained in the document about how your response will be handled. The consultation document is available here:

[Consultation Document](#)

[Privacy Notice](#)

I confirm that I have read and understood the Privacy Notice which explains how my personal data will be used.

About you

Please choose whether you are responding as an individual or on behalf of an organisation.

Note: If you choose "individual" and consent to have the response published, it will appear under your own name. If you choose "on behalf of an organisation" and consent to have the response published, it will be published under the organisation's name.

an individual

Which of the following best describes you? (If you are a professional or academic, but not in a subject relevant to the consultation, please choose "Member of the public".)

Academic with expertise in a relevant subject

Please select the category which best describes your organisation

No Response

Please choose one of the following:

I am content for this response to be published and attributed to me or my organisation

Please provide your Full Name or the name of your organisation. (Only give the name of your organisation if you are submitting a response on its behalf).
(Note: the name will not be published if you have asked for the response to be anonymous or "not for publication". Otherwise this is the name that will be published with your response).

Dr. Alexandra Price

Please provide details of a way in which we can contact you if there are queries regarding your response. Email is preferred but you can also provide a postal address or phone number.

We will not publish these details.

Aim and approach - Note: All answers to the questions in this section may be published (unless your response is "not for publication").

Q1. Which of the following best expresses your view of the proposed Bill? Please note that this question is compulsory.

Fully supportive

Please explain the reasons for your response.

The market mechanisms and public understanding are insufficient to result in improved standards; the only way they will be implemented is through regulation. Poor insulation locks householders into high carbon emissions for a time scale that is longer than the timescales associated with zero carbon ambitions. Implementing insulation during initial construction is more cost effective than retrofitting. Furthermore, retrofitting is often less effective due to heat bridges. It is easier to design these out from the beginning. Moving the insulation effort into the near rather than far future has a couple of other advantages: firstly it will make it easier to achieve net zero as reductions in the rate of emissions sooner has a cumulative impact; secondly it will give market signals to insulation manufacturers that will nudge them to upscale, and this will help them cope with the increased demand associated with achieving net zero. Home insulation is an important first step for any type of clean heat alternative. It lowers the overall heat demand, which means that when new heat sources such as heat pumps are installed, they are cheaper as they have a lower capacity compared to that required in an uninsulated home. Furthermore, many clean heat technologies such as heat exchangers on forced air ventilation (a standard in Scandinavian homes for decades now) require a fully draft-proof home for them to work. Insulation is considered a first step and a technology enabler for a wide range of clean heat technologies.

Q2. Do you think legislation is required, or are there other ways in which the proposed Bill's aims could be achieved more effectively? Please explain the reasons for your response.

I think regulation is required. And because it is required, there will probably be a backlash, so this must be managed with public awareness campaigns in parallel. We are on the precipice of a fuel-poverty crisis. This will certainly raise awareness but probably won't result in a mass change in behaviour of home buyers or building firms. There might be something clever to be done by supporting local insulation manufacturers in parallel to avoid supply change bottlenecks that are likely when Russia cuts the gas supply to central Europe.

Q3. Which of the following best expresses your view on setting the Passivhaus standard or a Scottish equivalent as the most appropriate new build housing standards to contribute to eradicating fuel poverty?

Partially supportive

Please explain the reasons for your response.

It might be useful to have a staged approach to allow homeowners get used to the jump in price. I've heard that you can get 80% of the passivehoos benefits with 20% of the costs - so a new or existing standard could be used for a couple of years along with stimulus to local supply chain companies and training programmes. I am not sure that owners of new build homes are representative of those most at risk of fuel poverty: this seems to be more people who are stuck in exploitative rent situations. Increasing building standards might increase rents so this will need to be monitored. The retrofitting of rented homes will have the most impact on fuel poverty.

Q4. Which of the following best expresses your view on setting the Passivhaus standard or a Scottish equivalent as the most appropriate new build housing standards to contribute to a reduction in emissions?

Partially supportive

Please explain the reasons for your response.

It might be useful to have a staged approach to allow the supply chain to respond. So a new or existing standard could be used for a couple of years along with stimulus to local supply chain companies and training programmes. If we set Passivhoos as a standard now we would have supply chain bottlenecks as many of the components are made in North Europe where these standards are common, and where the Ukrainian war will lead to a dramatic surge in demand. We also don't have the trained workforce. Existing insulation installers often leave heat bridges because they don't understand how insulation fits into the overall passivehoos concept.

Q5. Which of the following best expresses your view of the process set out to ensure that the new standards are met in all new build housing? (see pages 14 to 16 in the consultation document)

Unsure

Please explain the reasons for your response, including your views on how effective the process would be in removing the 'performance gap' and on how the proposed verification process might work in practice.

I haven't read the consultation document; don't know where it is and don't have time to read it.

Q6. What could be the market effects of the introduction of this proposal?

It depends on whether the supply-chain bottle necks and lack of trained work force are dealt with. If not, there will be supply chain bottle necks, long lead times, cowboy installation, a reduction in the number of new homes built each year, and a public backlash. If this can be wrapped into a possible narrative about insulation-jobs then that would sweeten the extra money that homeowners will have to pay.

Financial Implications

Q7. Any new law can have a financial impact which would affect individuals, businesses, the public sector, or others. What financial impact do you think this proposal could have if it became law?

a significant increase in costs

Please explain the reasons for your answer, including whom you would expect to feel the financial impact of the proposal, and if there are any ways you think the proposal could be delivered more cost-effectively.

This will be perceived by the public to be a significant increase in costs compared to building and buying a poorly insulated new home. It is in fact cheaper and quicker and more effective than building a poorly insulated home and then retrofitting it. So a public education programme, and a stimulus to the local supply chain is essential to put this increase in cost into perspective.

Equalities

Q8. Any new law can have an impact on different individuals in society, for example as a result of their age, disability, gender re-assignment, marriage and civil partnership status, pregnancy and maternity, race, religion or belief, sex or sexual orientation.

What impact could this proposal have on particular people if it became law? If you do not have a view skip to next question.

Please explain the reasons for your answer and if there are any ways you think the proposal could avoid negative impacts on particular people.

This would have an impact on builders, who are mainly working class men. Older men who aren't able to retrain will feel disadvantaged and may oppose changes. Younger men will benefit from the free training. The influx of big training cohorts gives an opportunity to specifically recruit other genders. The increased house prices will have an impact on those who are looking to buy new homes. A lot of these might be young families who work in cities - anything that slows down house building would impact them.

Sustainability

Q9. Any new law can impact on work to protect and enhance the environment, achieve a sustainable economy, and create a strong, healthy, and just society for future generations.

Do you think the proposal could impact in any of these areas? If you do not have a view then skip to next question

Please explain the reasons for your answer, including what you think the impact of the proposal could be, and if there are any ways you think the proposal could avoid negative impacts?

This is an excellent proposal for carbon reduction and reduction of sick building syndrome. If we combine this with mass-training programmes and support of British grown (e.g. hemp / wood) and manufactured insulation materials then this will create a sustainable economy.

General

Q10. Do you have any other additional comments or suggestions on the proposed Bill (which have not already been covered in any of your responses to earlier questions)?

No Response