

NFA response to the Government's open consultation on Energy Performance Certificates in buildings: call for evidence

Introduction

The National Federation of ALMOs (NFA) (www.almos.org.uk) is the trade body which represents all housing Arms' Length Management Organisations (ALMOs) across England. The NFA represents 32 ALMOs which manage just over 440,000 properties across 35 local authorities. The NFA represents the interests of ALMOs at the national level and provides advice and support for members. We have only answered those questions relevant to us and our members.

Consultation response

- 1. Have we captured all of the current uses of EPCs? Are there any existing or emerging uses we should be aware of?**
- 2. Do you agree that we have identified the key attributes for EPCs? Are there other important attributes we have not listed? Please indicate how important you consider each attribute and provide details to explain your answer.**
- 3. Which attributes are important for which uses and why?**

Although we agree that you have listed the key attributes of EPCs at the moment we would like to see them include an element of looking to the longer term 2050 goal of low to zero-carbon and how property owners might get their properties to that goal.

There is often a conflict between measures that might be quick and fairly cheap in the short term to improve energy efficiency slightly and deeper retrofit measures which may be required to meet the longer-term goals of reducing our carbon emissions as a country. Some of the interim measures can actually make it harder to complete a full retrofit and some are just not good value for money if the aim is to bring the property up to low or zero-carbon eventually. It would be good for property owners to understand the options and the value for money over certain time periods especially when considering major work or refurbishment projects. We also think this is useful information for both private landlords and homeowners so they can at least make an informed decision.

As a membership organisation for social housing providers with a long-term interest in their homes and a commitment to improve energy efficiency for both their tenant's financial benefit and comfort as well as contributing to meeting our climate change goals, we fully support measures which will help incentivise further work in this area.

The baseline data which is collected (provided it is accurate) is helpful, and with some minor additions this could be even more helpful. This data is used for in depth analysis, project planning and design. It could also be used to input information to Building Information Models.

Other uses include:

- Identifying trends to show areas where to target ECO funding for example.
- Informing area based retrofit strategies.
- Estimating market size for product development.
- Making the initial assessment stock suitability for whole-house and/or deep retrofit measures
- Analysis of an area or the national housing stock to inform policy and larger schemes

	<i>Very important</i>	<i>Important</i>	<i>Somewhat important</i>	<i>Not important</i>	<i>Unsure/no opinion</i>
<i>Reliability</i>	X				
<i>Accuracy</i>	X				
<i>Up to date</i>		X			
<i>Improves energy performance</i>		X			
<i>Influences property decisions</i>		X			
<i>Access to data</i>		X			
<i>Coverage</i>			X		
<i>Simple and low cost</i>			X		

We believe that the accuracy and reliability of the survey are of utmost importance to the whole purpose behind the scheme. Our members have told us of the unreliability of some certificates and therefore their lack of trust in the system. If they are to be a tool for improving energy efficiency and guiding home owners' and landlord decisions on investment to improve energy efficiency then they must at the very least be reliable and accurate. It would be better to pay more for a decent survey and be able to trust the information than pay less for something which no-one trusts so is not worth anything.

We believe it should be reasonably up to date and think that introducing more trigger points for a renewal of the EPC would be the best way of capturing change when an energy efficient measure has been completed.

Full access to the data for every home owner/landlord should be the norm and would allow for information to be held and used by property owners when considering refurbishment or selling on to a new owner.

4. What evidence do you have relating to the reliability of EPC assessments? Do you have any information on how reliability varies across different properties, and/or the likely sources of variation in assessments? It would be helpful to indicate how recent this is.

We have been told anecdotally by members that there have been quality concerns over some of the EPCs done on their stock. Nottingham City Homes has told us that they have had to discard whole batches completed in the past because they have found that there are basic elements which are inaccurate and therefore which render the EPCs completely ineffective.

They have found discrepancies between different assessors. As an example, their recently completed EnergieSprong pilots at West Walk required them to check the initial energy performance of the properties through EPCs, and then through a combination of technical work - taking wall coverings off, roof tiles etc, and talking to tenants, we also saw how the buildings were actually performing. Some of the issues they found:

- The measured m2 area varies from 77m2 to 94m2 in properties which are identical.
- On the same street #36 is said to have 200mm of loft insulation, actually there is <50mm
- The walls of the homes are assigned a different makeup depending on the assessor

These are system-built properties from c1970 – cross walls with timber wall panels spanning between the concrete walls. System built properties do tend to confuse assessors, and there is also an expectation that they are fully insulated due to when they were built. In reality this is not the case.

Some of these issues can be really obvious, such as archetypes being completely incorrect, and wall types being stated as traditional brick when they are clearly not so. This is unacceptable, and there should be a quality control approach to eradicate these types of error. The assessor would need to be made responsible and accountable for the information they supply, and householders or property owners would need to be able to see all data which was used for the EPC.

There are more challenging circumstances where it is difficult for an assessor to accurately assess the type of property. For these situations it would be useful for past data on the property to be available to an assessor as a desk-based survey. For example, properties which have a render finish externally, from many years ago, are sometimes classed as insulated. However, this is actually just render – not insulation covered by render. A good surveyor should investigate enough to understand this, but it is not always easy without intrusive works which a customer / home owner may not wish to be undertaken. Having a comprehensive database or building log book which compiled information from a range of sources, including past surveys, would be really helpful.

Also EPCs can falsely inflate the performance of the property through assessors assuming that measures installed 15 + years ago last forever.

Our members have not been able to identify the reasons for this level of variation and think that much of it is likely to be due to unintentional discrepancies due to different levels of training and experience amongst EPC assessors, different auditing processes and software employed by different accreditation bodies, or because competition on price between different assessors pushes them to spend less time in a building which means they make more errors.

5. Which of the suggestions provided above do you think would be effective in improving the reliability of EPC ratings? Do you have any other suggestions for improving EPC reliability? Please provide reasoning and any evidence you have to support your response.

	<i>Very effective</i>	<i>Effective</i>	<i>Somewhat effective</i>	<i>Not effective</i>	<i>Counterproductive</i>	<i>Unsure/no opinion</i>
<i>Apps and smart defaults</i>						X
<i>Better measurement technologies</i>		X				
<i>Ability to use survey data from previous EPC</i>	X					
<i>Access to additional sources of data about the building</i>	X					
<i>Strengthened quality assurance</i>	X					
<i>Other suggestion (please give details below)</i> <i>Legal liability for an EPC surveyor similar to property surveyor</i>						

We believe there needs to be more accountability for incorrect EPCs. Self-regulation by the accrediting bodies of its members does not seem to be working. There appears to be no monitoring or enforcement of assessors' quality of reports. Current procedures are not working so we believe that more stringent and standard approach nationally would be the best solution. Perhaps imposing legal liability on EPC surveyors for inaccurate EPCs would encourage more thorough and accurate surveys

6. What evidence do you have on the accuracy of the models used to produce EPCs (SAP, RdSAP, SBEM, DSM) in comparison to other methods such as the co-heating test?

Again our member Nottingham City Homes has provided some evidence from their EnergieSprong project, Melius Homes, which is measuring the in-use performance of

10 dwellings and comparing the theoretical performance with the measured, adjusting for internal and external conditions. This work suggests that the underlying building physics model is strong if the input data is correct. This is consistent with the work of the Zero Carbon Hub which compared SAP, PHPP, Energy Plus and IES on the same dwellings with the same assumptions. This found that SAP was surprisingly close to the more sophisticated models despite its relative simplicity. The problems were with the inputs not the model. The input can be wrong due to incorrect assumptions or elements not performing as assumed in lab testing.

Other members have said that EPCs are a good way of comparing like with like properties at a national scale. Comparisons are useful for heating and construction information and the existing ratings are a useful way of grading properties in a clear and understandable way. The level and range of data required to produce the EPC is in our opinion satisfactory as long as it is done accurately.

7 . Are you developing any kind of tool for measuring the energy performance of buildings (controlling for the effects of occupant behaviour) using smart meter data or other data, which could be relevant for EPCs?

No

8. What evidence do you have on how EPC accuracy could be improved using the tools and data sources outlined above, or through any other means?

We have no further evidence from members.

9. What evidence do you have on how frequently people are likely to make updates to their properties which would change the EPC score?

For our members many general updates to their properties were made from 2002 - 2012 as part of the Decent Homes programme. These increased average SAP ratings at the time and helped tackle fuel poverty amongst tenants. Alongside that work and since then a number of additional energy efficiency programmes have been undertaken through various government sponsored programs such as CESP (Community Energy Saving Programme) and CERT (Carbon Emissions Reduction Target) and more recently ECO, FiT, RHI. Many of our members have now brought their average SAP up to 70 (EPC category C) and are trying to deal with the worst performing stock left where possible. Councils and ALMOs will then have plans over the next 30 years to maintain those properties to the Decent Homes Standard and will plan major works over that time to ensure they meet those standards.

However, the current Decent Homes Standard requirements on energy efficiency are far below the levels of energy efficiency needed to achieve the government's statutory target of cutting UK carbon emissions by 80% by 2050.

In order to help drive further improvements in the social housing sector it will be necessary to improve the requirements within the decent homes standard or introduce new separate targets on energy efficiency and the use of renewable energy for social housing landlords. It will also be necessary to make the funding required to achieve this available from government or support schemes which help to

pay for themselves through savings which the landlord can capture as well as the tenant.

We don't have information on how frequently works would be undertaken and this would vary from landlord to landlord depending on stock type and condition but if significant energy efficiency work was a trigger for an updated EPC and it could be updated with that information relatively easily and quickly then landlords could help keep them up to date as and when they carried out work.

10. Which of the suggestions provided above do you think would be effective in ensuring that the information on EPCs is up to date? Do you have any other suggestions for ensuring EPCs remain up to date? Please provide reasoning and any evidence you have to support your response.

If previous EPC survey data can be fully shared then this can simply be updated when a measure is installed or replaced rather than the whole survey been done again. This will significantly reduce barriers (e.g. cost and hassle) and it is more likely that the data will be up-to-date.

When having an EPC for measures to be installed, it should be a before and after, with after being lodged when evidence is supplied. If people had access to what was installed via a different database e.g. OFGEM they could also incorporate this knowledge to create the most accurate picture.

A live EPC report document held online would ensure that EPCs are up to date. When insulation is fitted it or another energy efficiency upgrade by registered installer has been fitted, then the EPC could be updated by a form similar to a CAS register or a link between the databases whereby when improvements are made the EPC automatically or as part of the process is updated also.

13. Which of the suggestions provided above do you think would be effective in encouraging building owners to make appropriate energy performance improvements to their property?

Members have suggested that making all the EPC survey information available will lower the initial barriers (cost of analysis of homes via first visits and surveys) and enable more ambitious programmes that can deliver against our 2050 climate targets to be developed. Finding the starting points for these early schemes is challenging so lowering the barriers to analysing housing information will help.

The automatically generated suggestions are at best a stimulus to asking questions, a call to action. Often the measures are simplistic and focus on single measure approaches. Too often the correct measures are not listed because they are deemed too expensive. As a matter of policy all measures necessary to make the home a '2030' home and a '2050' home should be listed – i.e. effectively within one mortgage term or for our members a 30-year business plan. This would encourage whole house thinking and an appreciation of what ultimately needs to happen to each property.

18. What evidence do you have on how easy it is to access EPC data or Open Data? If you are currently a user of the Open Data Communities website, what do you use the information for and how valuable is this website as a source of data?

Our members report that It's a good start but a shame that the thermal performance of buildings cannot be calculated as the space heating requirement (kWh/annum) is not included in the Open Data set. These measures were introduced for the RHI, so will not be available for older surveys. The thermal performance of buildings, measured in kWh/m², is absolutely key in understanding the relative energy efficiency performance and would be a good indicator as to the performance of our stock across the country and what progress the country or large-landlords are really making, much more important than counting number of measures installed, for example.

It would be valuable if there was a feature to enable a bulk download of EPCs for Housing Providers or Local Authorities.

19. Which of the suggestions provided above do you think would improve the ability of building owners and other stakeholders to make effective use of EPC data? Do you have any other suggestions? Please provide reasoning and any evidence you have to support your response.

For our members access to all the survey data that has been collected is very important. This includes all survey data, including, measured plans, photographs, measures installed, building fabric, heating systems, types and conditions.

20. Do you think a 'data warehouse', 'building log book' and/or 'green building passport' would be useful in increasing take up of energy efficiency improvements or supporting existing initiatives?

We are interested in both online data storage for each building owned/managed by our members and the idea of a building log book. We are engaging with MHCLG on the recommendations coming from the independent Review of Building Regulations and Fire Safety led by Dame Judith Hackitt. One of the ideas that is seen by our sector as being very useful is that of a building log book which records all of the significant changes to a building over time. We would like to see this joined up with any recommendations coming from BEIS regarding the EPC data and think this could be a very useful tool for landlords.

26. This Call for Evidence has outlined a number of options for making improvements to EPCs. Of the suggestions discussed in this document or which you have put forward, is there one or more you think is particularly important, or are there any other suggestions you have or comments you want to make about EPCs?

Overall our members believe that EPCs are a useful way of comparing homes, they are a consistent national method and have become a very useful tool in this context. However, currently they are not reliable or accurate enough to be used for some of the purposes they are being used for. Energy efficiency work is then carried out which means the EPC is not accurate anyway, and it is not updated.

It would be far more efficient to log all data from a more detailed and more expensive EPC onto a portal, which would also combine other data sources, including historic information about schemes which have included energy measures, to create a full picture of that property. At any subsequent EPC inspection, the surveyor could focus on checking the data and updating, rather than doing the same quick measurements and ending up with something different, also not necessarily accurate again. The availability of data would also help those planning and designing schemes to do this without having to go into every property again. This would result in a far smoother engagement process for private occupiers as well as tenants.

Current EPCs are not advising on a package of measures which achieves the low to zero carbon performance required by the property in just over 30 years. Therefore if they are to start being used for these purposes it is really important that there is a clear link to policy requiring zero carbon housing, and that people are aware of the route to achieve that.

Any decision to invest in energy measures which require grant funding should require an assessment of how the measure moves the home towards being zero carbon and this should be reflected in the EPC.

It is crucial that EPC assessors are made accountable. In order to enforce this a method of logging whoever enters information onto the live EPC data base, so that it is possible to revisit anything which is incorrect.

Some of our members have concerns about how dynamic an EPC can be. It has strengths through being a clear snapshot in time and reasonably straightforward. The link to smart meters would start to create a complex digital infrastructure and set of caveats to contextualise the information. EPCs, being based on SAP, have a clear point of reference in terms of geography, climate and occupancy, while smart meter data is driven by household occupancy, lifestyle, finances and perception of personal comfort. There is a risk that trying to merge the 2 will undermine the existing strengths of EPCs without adding useful information. Smart meter information can be used to understand the performance gap (ie the gap between the building design and its actual performance), and this is significant in terms of green mortgages and national CO2 emissions, but we don't see EPCs as the correct location to communicate this to building occupiers and users.