

OPINION

How to deal with energy poverty when there is no comprehensive research or definition on it?

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As the Western Balkan countries are far from solving the issue of energy poor households due to inability, high poverty, corruption or simply no sense for the gravity of the problem it is important to keep pressing and keep advocating for greater visibility of this issue.

The first problem which must be solved is a comprehensive and thorough research of what energy poverty represents and who is energy poor in each country; followed by making and adopting of an official definition of first, energy poverty and second, vulnerable customers which are affected by it; and at the end creating and implementing measures which would tackle energy poverty and assist households in getting out of it.

It is estimated that between 50 and 125 million people in the EU (around 10 - 25 %) are facing energy poverty. The situation is even worse in Eastern European countries: 30% or more of households are facing energy poverty. EU is trying to develop solutions to tackle this problem, but it is still working on several issues, such as establishing on a country level a definition of energy poverty, setting up of regular monitoring of the breadth and depth of the problem and creating clear policies with regard to the fight against energy poverty.

The threat is pertinent due to the fact that not only people who officially are under the poverty line in one country can be considered as energy poor. Poverty in general and energy poverty are certainly connected, but the issue with energy poverty is much more complex than just saying that only people who are poor anyhow are energy poor as well. There are many definitions in use on what energy poverty actually is; one of the newest tries to define it is: **a household is in fuel poverty if it would need to spend more than 10 per cent of its income to achieve an adequate level of warmth through the year and on other energy costs^{1,2} or “a household that faces higher than typical costs; and were it to spend that amount, would fall below the official poverty line in the country.”³** Meaning it's NOT the amount of money spent but rather what the household would need to spend in order to have its energy needs covered throughout the year.

There are also many projects⁴, especially EU funded, which work or will work on trying to solve energy poverty in Eastern Europe/Western Balkans by either researching it thoroughly or assisting directly the households in trying to alleviate them from it. However, the Western Balkan countries are still lagging behind in dealing with this pressing issue. Why is important to start working on it now? According to the Treaty of the Energy Community, the signatory parties must from 1 January 2015 liberalize their energy markets for all customers.⁵ Opening and liberalizing the markets will affect the customers directly as the prices will go up leaving them with few solutions of how to meet

¹ Fuel poverty, roof renting and Feed-in-tariff – some number crunching

<http://www.melstarrs.com/elemental/2011/11/15/fuel-poverty-roof-renting-and-feed-in-tariff-some-number-crunching/>

² The 10% threshold is mainly for the UK, as in the context of the Western Balkan countries, due to the large poverty rates, it could put almost all of the population in the energy poor category.

³ <http://www.theguardian.com/big-energy-debate/fuel-poverty-climate-change-targets>

⁴ Such as Intelligent Energy funded: Achieve, REACH, EC-LINC <http://www.achieve-project.eu/>; <http://www.focus.si/index.php?node=25&id=1424>; <http://www.ec-linc.info/> etc.

⁵ More on what the Energy Community does: http://www.energy-community.org/portal/page/portal/ENC_HOME/AREAS_OF_WORK

their energy needs. The issue is not new and stems from: *“in the communist system the electricity prices have been kept artificially low, resulting in the expansion of electricity for heating and widespread abandonment of district heating. Also, an increased reliance on fuelwood for heating especially applicable to low income households was noted⁶. As communism fell in the beginning of the 90ies so the problems with energy affordability started to rise. As the Western Balkan countries began transforming their systems, the energy was no longer guaranteed by the state but a good i.e. a service that is bought on the market just as any other. Needless is to say that the situation is much more complicated as energy is a commodity without which modern life as we know it is not possible.”⁷* This will only be exacerbated with the liberalization of the markets and there have been no serious policies introduced on country level in order to assist households in addressing the issues arising from the reforms of the energy systems anywhere in the Balkans.

Analytica worked and plans to continue working on energy poverty as part of its main objective to contribute to reforms in Macedonian society and better policies for solving issues. Last year in collaboration with Konrad Adenauer Stiftung organized a conference where stakeholders from the region gathered to discuss energy poverty and the means to solve it. Analytica prepared a policy paper on the topic, where a thorough analysis of the existing legislation concerning energy poverty was done, as well as an analysis of the current theories regarding who is considered energy poor and what the recommendations are. As a reminder, *“it is clear that the reasons for energy poverty is artificially low electricity price being responsible for widely used electric heat, abandonment of district heating and energy wasteful practices; which was triggered by the increase of energy prices, leaving the consumers faced with limited financial means, limited ways for heating (no alternative for heating as natural gas, only option possibly biomass) and energy inefficient homes.”⁸*

Macedonia despite the issues mentioned does not have a definition of a vulnerable customer nor does it define energy poverty in any way even though the term is being used⁹. There is no official number of how many households are affected by it either. Some estimations¹⁰ put it to more than half of all households! This just shows the seriousness of the problem. The research on this topic is also obscure and the need to extend it is more than urgent. Hence why foreign donors as well as the state must put bigger emphasis on funding research as well as implementation of what is written such as policies trying to alleviate energy poverty¹¹. In the meantime civil society needs to keep

⁶ Stefan Bouzarovski et al, *The governance of energy poverty in Southeastern Europe*, Ifri, (2011)

⁷ Energy poverty in Macedonia, Ana Stojilovska and Sonja Zuber, Analytica, Skopje, September 2013; Link to the policy brief: http://analyticamk.org/images/stories/files/energy_poverty/poverty_eng.pdf

⁸ Ibid.,

⁹ However it is obliged to prepare one by the end of 2014.

¹⁰ Ana Stojilovska, Sonja Zuber, http://analyticamk.org/images/stories/files/energy_poverty/poverty_eng.pdf, page 7.

¹¹ Recommendations such as: 1). The subsidy for energy consumption to be gradually replaced by one time free of charge investment in energy efficiency measures in well defined energy poor households starting with multi-member households, households with pensioners, households with several children, households with welfare beneficiaries, households headed by unemployed adults, households who depend on and households with young children; 2). The households belonging to the middle class especially with pensioners and young children to invest in energy efficiency in their homes and if applicable to consider using more efficient fuelwood stoves and other types of biomass not only fuelwood; 3). The municipalities to consider tackling energy poverty in their energy efficiency plans by including implementation of energy efficiency measures in the households too, to consider

advocating for these funds as well as for better policies and actions towards energy poor households as the battle has just started.

Meanwhile pilot research projects can be conducted on smaller samples in urban and rural areas to check and establish who and under what circumstances can be characterized as energy poor. There are different methods that can be used such as:

- Self-reporting – the risk is - will it work? Many people fear the stigma the word ‘poverty’ carries so may not feel comfortable telling that they do struggle with paying the bills or that the characteristics of their energy spending puts them in the category of ‘energy poor households’. Hence why the approach towards these issues is as important as getting the right information from the households;
- Expenditure method of calculating energy poverty – but is it enough? Does only calculating how much one spends or should spend is enough to determine if he/she is energy poor? Many outside factors such as whether it is a rural or urban area, the availability of heating or cooling sources as well as the inability to maybe do some changes in the dwelling due to property ownership issues might have a bigger impact on who we determine is energy poor than the money spent on bills;
- Direct measurement – what methodology will be used?
- How big is the energy degradation of the housing stock? Highly important especially in the Western Balkans as the housing stock is still mostly from pre-1990’s when poor energy efficiency (EE) standards were implemented;
- What is the scale of domestic energy deprivation?
- Does 10% of the income go to energy providing and is 10% the right threshold for every country or should be changed according to the local situation?¹²

In this regard as mentioned, polls from Macedonia show that around 50% of households in the country cannot keep their homes adequately warm.¹³ Hence why the policy response should follow these guidelines:

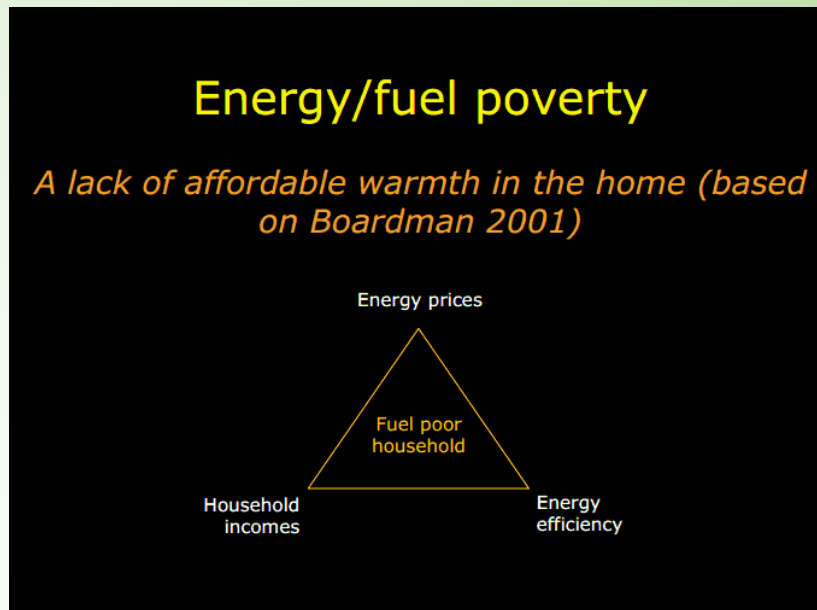
- What is the affordability of energy in the urban and in the rural surroundings?
- Poor housing stock – how to deal with this on policy and implementation level?
- EE measures – how to implement them without putting too much burden on the households who cannot afford paying for energy efficiency in their homes;
- Country specific energy poverty – adequate warmth plus other energy services – what is a rule on EU level might not be appropriate in the local context – hence why it is important to determine the definitions of energy poverty and vulnerable customer on a country level.

implementing local gasification projects with aim also to bring natural gas to households and building small cogeneration utilities. See more: http://analyticamk.org/images/stories/files/energy_poverty/poverty_eng.pdf; pages 12 &13.

¹² Based on Stefan Bouzarovski’s presentation on Energy Poverty given in Ljubljana, Slovenia, 25th of April 2014.

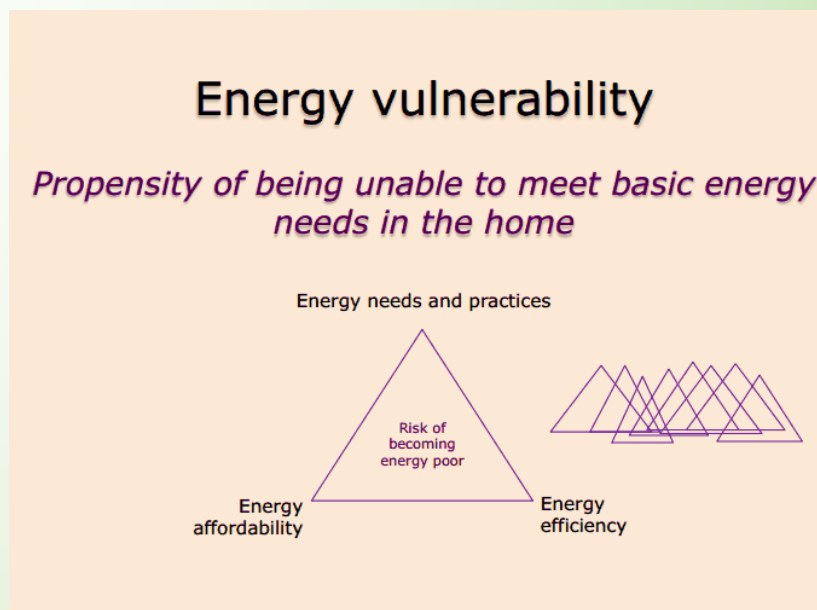
¹³ State Statistical Office.

1). Graphic showing of the definition on energy poor household¹⁴:



2). Graphic showing of the risks that households face which can turn them into energy poor¹⁵:

The three angles are the three factors contributing to making a household energy poor, or what factors contribute to 'tip' the household into energy poverty.



¹⁴ See <https://docs.google.com/file/d/0Bx7StTrzYqZ6NDNGQ0V5SUY4U2c/edit?pli=1>

¹⁵ Ibid.,

Recommendations for the households

In all the talk most of the proposals are referred to the stakeholders which can implement measures and policies in the fight against energy poverty and which have or can obtain funds to lead that fight. However households, no matter if they are or not under any definition energy poor, can and should be advised and guided into recognizing the pertinent energy issues in their own homes. Education is above all the greatest tool in eliminating any poverty. Thus for one household it is important to know the following:

How to recognize if a household might be suffering from energy poverty:

- Check water and electricity devices (how old they are, what type, how much they spend);
- Check the building's characteristics (when it is built, what kind of insulation it has, in what condition is the roof, the type of windows and how old they are etc.);
- See what are ALL available options for heating and cooling of the home and compare prices yearly;
- What is the energy efficiency of the dwelling like (how much energy is required to heat, power and cool the home);
- What is the household income;
- See if there are any unresolved leakages, broken appliances, water taps etc that should be replaced;
- What is the needed cost of energy (not how much the household pays but how much it needs to pay in order to feel comfortable in the home – temperature 21C where they sit and 18C in the other rooms);
- A calculation needs to be made on what it would cost to heat a home to particular temperatures (21 degrees Celsius for the main living area, and 18 degrees Celsius for other occupied rooms), plus the money needed for other energy costs, based mainly on the average energy use of household for the number of people in the household and their dwelling size. This is NOT actual spending, as that might be a sign of very low costs for those who are living at low temperatures or just use one room out of the whole dwelling instead of all of them, or on the other hand it can be a sign of very high costs for those who are wasteful in their use of energy.¹⁶ If the calculation of these needs makes the household to go under the official poverty line with what it is left of its budget, the possibility of having energy poverty there are more than likely;
- See and compare the utility bills with neighbors, family, friends which live in similar circumstances;

¹⁶ Fuel poverty, roof renting and Feed-in-tariff – some number crunching

<http://www.melstarrs.com/elemental/2011/11/15/fuel-poverty-roof-renting-and-feed-in-tariff-some-number-crunching/>

- Check with housing association and the municipal authorities about the possibilities for grants or loans for implementing measures of energy efficiency in the building and dwelling.

As a conclusion, one might say that the toughest part is not behind but ahead of us. Although energy poverty is recognized as an issue, its actual scope and consequences are left to be discovered. It is

Rules on eradicating energy poverty:

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|---|
| <ul style="list-style-type: none">- The poor must live in the MOST energy efficient homes! |
| <ul style="list-style-type: none">- Tackle energy poverty on a community level – wide basis not individual homes! |

important to remember that the entire society is affected by it, from the single citizen to the last enterprise. It is expensive to deal with, but the consequences will cost much more,

from dwindled economic growth to increased deaths. Hence why there is an urgent need to address this issue.