



The Energy Efficiency Directive

A HCWH Europe position paper

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Energy and health

In 2012, according to the World Health Organization (WHO), 7 million deaths were related to indoor and outdoor air pollution, representing one eighth of global deaths.¹ Air pollution is the single largest environmental threat to human health, and energy production and energy use account for the majority of air pollution caused by human activity.²

Reducing energy use lowers reliance on burning coal and other methods of generating electricity through fossil fuel combustion, thus reducing harmful emissions. Reducing these emissions directly benefits human health as fossil fuel emissions directly contribute to the burden of diseases such as cancers, strokes, respiratory diseases, and heart disease.²

Energy efficiency in healthcare

The healthcare sector is a highly energy intensive sector - not only are vast amounts of energy needed to deliver care, but also throughout supply chains. The approximately 15,000 hospitals across the European Union (EU) have a high demand for heating and electricity and require a large amount of energy for transport, lighting, ventilation, air conditioning, and electric and electronic equipment. Energy is also used in the manufacturing of products and procurement of services throughout the healthcare sector's supply chain. This intensive energy-use translates to large amounts of GHG emissions.

A recent study published by the World Bank Group estimates that the health sector generates 5% of global CO₂e emissions (2.6 billion metric tons) annually.³ In England, the carbon footprint of the Nation Health Service (NHS), public health, and commissioned local authorities providing adult social services represent 40% of all GHG emissions from the public sector.²

The activities and services of the healthcare sector have a large impact on the health of their environments and communities; as the healthcare sector works to treat people, it is also contributing to harming human health.

Case studies

The healthcare sector can benefit immensely from increasing energy efficiency and reducing energy costs - this can be achieved whilst simultaneously improving the quality of care provision, and the health of patients, staff, and the communities they serve. Hospitals across Europe are increasingly recognising the multiple benefits of improved energy efficiency, and are already adopting strategies that produce significant savings such as the following examples from the HCWH Europe network.

FRANCE

Centre Hospitalier de Niort built the first positive energy building in the Poitou-Charentes region in 2014. The hospital was built to maximise natural light and reduce primary energy consumption: the facade is covered with wood certified for solar protection, and the boiler is fuelled with wooden pellets and generates 3.1 MW of power. There is double-flux ventilation throughout the entire building, which helps heat and cool the building more quickly - a great example of how energy efficiency can be maximised if efficiency strategies are considered during the design phase of a building.⁴

GERMANY

Friends of the Earth Germany (BUND) established the “*Energy Saving Hospital Label*”, awarded to German hospitals that have achieved outstanding results in the fields of energy saving and climate protection. Today, 45 German hospitals have received the BUND label, collectively reducing CO₂ emissions by 65,000 tonnes of per year and saving over €20 million per year across all 45 hospitals bearing the label.⁴

ENGLAND

Barts NHS Trust along with *Global Action Plan (GAP)* developed *Operation TLC*, a behaviour change program working to improve energy efficiency of hospitals. Operation TLC provides education and training to staff to save energy through simple everyday practices: **T**urn off equipment, **L**ights out, and **C**ontrol temperatures. Barts Trust saved £49,000 (€57,445) in the first year by simply turning off equipment that could be safely switched off during non-working hours, and by placing reminder stickers close to the light switches. In the first two years the Trust saved 1,900 tonnes of CO₂ and £428,000 (€501,764) per annum.⁵

These are only a few of many case studies that illustrate efforts that health systems are making to reduce their energy use and the leadership role they can play in reducing the environmental and health burden of the healthcare sector’s operations. For further examples, read HCWH Europe’s most recent report: [*Reducing healthcare’s climate footprint: Opportunities for European hospitals and health systems*](#).⁴

It is vital that these practices are not only improved upon but also replicated across the entire European healthcare sector. Many health systems, however, do not have the resources or the will to adopt similar energy saving initiatives. To systematise energy efficiency practices across the healthcare sector, an ambitious legislative framework is needed.

EU policy scenario

In 2014, climate and energy targets for a 27% improvement in energy efficiency by 2030 were adopted within the Energy Efficiency Directive (EED). In November 2016 the European Commission (EC) proposed to review these targets, aiming to increase them to 30% - this proposal is currently being debated by both the European Parliament and the Council of the EU.

Whilst the EED is only one of many legislative instruments* that will determine whether the EU will meet its Paris Agreement commitments, it does, however, have significant impact upon all other EU climate and energy files. To accelerate the transition to a low carbon economy and therefore meet the Paris Agreement’s objective to achieve zero global emissions in the second half of the 21st century, the EU will have to significantly reduce the amount of energy consumed in every country.

**Legislative files that are meant to collectively meet the EU’s Intended Nationally Determined Contribution to the Paris Agreement: Emissions Trading Scheme, Effort Sharing Regulation, and all other energy files under the Clean Energy for all Europeans Package.*

EU policy recommendations

Whilst the EC's proposal is to increase the targets of the EED, they are not ambitious enough nor are they compatible with the EU's commitments under the Paris Agreement. In order to achieve these commitments, HCWH Europe supports the position of Climate Action Network (CAN) Europe, in particular its recommendations for the following amendments to the revision of the EED:⁶

1. Introduce an energy efficiency target of at least 40% for 2030

The EU is already on track to meet its 2020 energy efficiency target, (20% energy saving compared to 2005 levels).⁷ Raising the target to only 30% shows an incredibly low level of ambition, especially when compliance with the 2020 targets has been successful. To achieve the ultimate goal of 100% renewable energy systems, the EU needs to first significantly cut down on energy use. To this end, and with the responsibility to comply with the Paris Agreement, a target of anything under 40% would be disappointing. Energy production and use account for the majority of air pollution caused by human activity.¹ A 40% energy saving target would encourage and empower the healthcare sector (and all sectors) to significantly reduce energy costs, and their carbon footprint, whilst also reducing the burden of disease caused by air pollution.

2. Support the EC's proposal for a binding 2030 energy saving target at the EU level, as well as with national binding targets

Binding targets would ensure commitment. Setting legally binding national targets would distribute the responsibility among Member States, and ensure that efforts are not concentrated in a small group of States who may be doing more in terms of energy saving. Although the healthcare sector plays an extremely demanding and important role in safeguarding a healthy population, it is often exempt from expectations to play a role as an environmental leader. Setting national binding targets is necessary in order to propagate energy saving responsibility across all national sectors, harmoniously. The healthcare sector has a long way to go to improve the efficiency of its energy intensive activities. Nevertheless, national targets must consider States' economic situation and energy saving capacities. We see this as an important measure that is very pertinent to the healthcare sector, as it would motivate greater energy saving efforts in less affluent member states.

3. Support the EC's proposal to extend the requirements on the Energy Efficiency Obligation (in Article 7 of the EED) beyond 2020

Article 7 of the EED sets a mandatory requirement for Member States to achieve 1.5% energy savings (of final energy sales) every year. Article 7 is expected to deliver most of the energy savings of the EED until 2020.⁸ Experiences from the healthcare sector demonstrate that progressively improving energy efficiency is achievable. Energy efficiency can be considered "low-hanging fruit"; significant savings can be achieved through low investment measures such as behaviour change practices, which translate into financial savings. Practical lessons can be learnt from many hospitals and health systems that are already working to improve the efficiency of their energy consumption. As the requirements outlined in Article 7 have proven to be achievable, and in light of the important role it has played in ensuring implementation in Member States, HCWH Europe welcomes the EC's proposal to extend Article 7 beyond 2020, and we call on the introduction of a long-term extension to 2050.

4. Strengthen Article 7 by eliminating loopholes

Article 7 of the EED plays a crucial role in the implementation of Member States' energy efficiency efforts, however, it currently includes a number of loopholes that allow Member States to half the amount of energy that is actually being saved. Member States are able to disregard the energy used in transport when they calculate the 1.5% goal, while at the same time they are able to count the energy saved in the transport sector towards delivering the 1.5% target.⁶ In other words, they are able to count the savings while disregarding the emissions of the same activities in the transport sector - this is a massive contradiction that significantly devalues the potential of Article 7.

Many hospitals are community service providers that rely heavily on transportation to deliver care in patient's homes. All health systems (community systems in particular), produce large amounts of emissions from their transportation activities. This escape clause would allow health systems to exclude a massive block of their emissions from their commitment under Article 7. In order for health systems to hold a homogenised responsibility under the EED, HCWH Europe echoes CAN Europe's position and calls for the removal of the clause allowing energy used in the transport sector to be excluded from the calculation of the 1.5% objective.⁶

HCWH Europe calls on the European Parliament and Council of the EU to support these recommendations, and not to underestimate the importance that energy efficiency measures will have on the success of all the other climate and energy policies and legislative proposals. An ambitious legislative framework is necessary to guide the health sector to significantly improve the efficiency of its energy intensive activities. This will help to reduce the sector's contribution to air pollution and, in doing so, protect the health of EU citizens and the environment.

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