Interreg Europe – Policy Learning Platform – Environment and Resource Efficiency

Policy brief

The role of cities and regions in promoting resource efficiency across the EU

The policy brief highlights the need to use resources in a sustainable way and presents key policy developments in this direction. Emphasis is put on policy actions of cities and regions aiming to improve resource efficiency.

1. Introduction

Global resource use is expected to double between 2010 and 2030 according to the Sustainable Europe Research Institute (SERI)[1]. Intensifying resource use exerts an increasing pressure on the environment, through impacts associated with resource extraction, use and disposal. Geographic concentration of reserves in a limited number of countries is a concern since it affords suppliers considerable influence over global prices and supplies[2].

By 2050, the world economy is expected to quadruple and the global population to grow from 7 billion today to over 9.2 billion. The OECD Environmental Outlook to 2050 shows the additional strain that this will place on the earth's material and energy resources and the environment. A growing population with higher average income requires more food, more industrial products, more energy and more water.[3]

Access to resources is a major concern for Europe as its economy is structurally dependent on imports. Europe has the world's highest net imports of resources per person, and its open economy relies heavily on imported raw materials[4]. Due to Europe's high dependence on imports, there is growing concern about the supply of particular materials. At the same time the EU's economy currently loses a significant amount of potential secondary raw material which is found in the waste stream. Although the resource productivity (GDP/domestic material consumption) of the EU-28 increased by 29% from 2000 to 2012, European consumption patterns still remain resource intensive by global standards[5].

2. Policy developments

A 'resource-efficient Europe' is one of seven flagship initiatives of the Europe 2020 strategy, which aims to deliver smart, sustainable and inclusive growth for the EU. The flagship initiative adopted in January 2011, provides a framework for policies to support the shift towards a resource-efficient economy with the overall objectives to boost economic performance while reducing resource use; to identify and create new opportunities for economic growth and greater innovation; to ensure security of supply of essential resources; and to fight against climate change and reduce the environmental impacts of resource use.

As a follow up to this flagship initiative, the Commission adopted in September 2011 the Roadmap to a Resource Efficient Europe in order to set a framework in which future actions can be designed and implemented in a coherent way. It provides a vision according to which 'By 2050 the EU's economy has grown in a way that respects resource constraints and planetary boundaries, thus contributing to global economic transformation. Our economy is competitive, inclusive and provides a high standard of living with

[1] SERI Global Material Flows Database, http://www.materialflows.net/home/, accessed on 22.11.2016
[2] European Environment Agency, "State and Outlook 2015", Assessment of global megatrends, 2015.
[3] OECD, Material Resources, Productivity and the Environment, 2015.
[4] European Environment Agency, "State and Outlook 2010", 2011.
[5] European Environment Agency, "State and Outlook 2015", Synthesis report, 2015.

much lower environmental impacts. All resources are sustainably managed, from raw materials to energy, water, air, land and soil'. The roadmap also sets milestones to be reached by 2020 and actions to be undertaken by the Commission and the EU Member States. The milestones and the actions are linked to specific resources (such as biodiversity, minerals and metals, water, air, land and soils and marine resources), to key sectors and to issues regarding governance and monitoring.

In November 2013, the 7th Environment Action Programme, one of the main policy documents of the EU was adopted. One of the priority objectives of the action programme is 'to turn the Union into a resource-efficient, green and competitive low-carbon economy'. In line with the 2050 vision of the policy document our prosperity and healthy environment will stem from an innovative, circular economy where nothing is wasted and where natural resources are managed sustainably and our future growth has long been decoupled from resource use.

The European Commission in December 2015 adopted a Circular Economy Package, which includes legislative proposals on waste with targets for landfill, reuse and recycling, to be met by 2030. The package also contains an action plan for the circular economy, mapping out a series of actions planned for the coming years. The measures of the action plan cover the full lifecycle of products: from production and consumption to waste management and the market for secondary raw materials.

3. The role of cities and regions

Increasing resource efficiency at regional and city level involves using resources sustainably, and at the same time also avoiding negative impacts for the environment. Resource efficiency policies provide opportunities for regional growth and job creation. Efficiency can lower unit costs for manufacturers and buyers through creating greater value from less input.

Although regional and local governments often have high ambitions when it comes to improving resource efficiency in their region, many of them are struggling to see what their role as regional policy-makers could be in enhancing and accelerating these developments. In line with their various roles regional and local governments can act as:

- legislators, passing regulation supporting more sustainable resource use
- authorities, ensuring compliance with legal instruments
- service providers (e.g. providers of utilities)
- launching customers or consumers, providing a positive role model
- enablers, encouraging positive action through the provision of economic incentives as well as acting as facilitators supporting partnership building
- knowledge provider

At regional level the opportunities for action largely depend on the institutional setting of the country. In general regions are more powerful in countries that are more decentralized, having more significant budgets and more independence in developing their own policies. In contrast, in more centralized states, where the regions are weak, the potential for action is limited.

Actions of regional and local authorities targeting at resource efficiency can address a range of resources; these can contribute among others to improved material resource efficiency through promoting the sustainable use of primary and secondary raw materials; or can support efficient water use; or efficient land and soil use; or can aim at sustainable management of biodiversity and ecosystem services, as it is illustrated below by some good practices from across Europe.

> ***Land-use efficiency**: Compact City model in urban and transport planning in Bocholt, Germany*
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> *Bocholt is an example of the application of the 'compact city' model. Small trip lengths are maintained in the city that are compatible with the bicycle and the pedestrian mode. Strict local regulations are applied concerning land use rules, specifically directed to the location of new commercial developments, where*

licensing is awarded only when accessibility can be guaranteed on foot or bicycle. Furthermore, strong emphasis is put on the achievement of significant diversity of land use types in the various neighbourhoods in order to ensure the functional independence of each area and to contribute this way to the reduction of average trip lengths.

Source: INTERREG IVC project "MMOVE"

***Water-use efficiency**: Water saving project in Emilia-Romagna Region, Italy*

Under the project domestic water saving kits, containing the latest faucet aerators for house taps and showers, were made available for households in Castel San Pietro Terme, Italy. Following the installation of the kits water consumption was monitored for a year, statistically analysed and communicated to the citizens. These measures were combined with a communication campaign on the water saving options in houses and gardens.

Source: INTERREG IVC project "WATER CoRe"

***Material resource efficiency**: Alelyckan Re-use Park in Gothenburg*

Re-use Park, established in 2007, is a place where inhabitants can bring products to be recycled, donate reusable material or buy goods donated by others (often repaired or upcycled). The park is owned by the municipality but it houses also specialized thrift shops that pay rent for the use of municipal facilities. All visitors are encouraged to donate or sell items for reuse, the rest is sorted into different waste fractions for materials recycling or energy recovery. The initiative resulted in the reuse of 5,5 % of materials that otherwise would have only been recycled.

Source: INTERREG IVC project "Pre-Waste"

***Efficient use of biomass**: Sustainable use of manure for protection of watercourses in Finland*

The LakeAdmin Project aimed to improve the effectiveness of regional development policies related to water management. As one of the numerous activities under the project different methods (manure separation, use of gypsum and bio-carbon) were tested in Eastern Finland to enhance the efficient use of manure on dairy farms and thus to diminish the nutrient runoff from farming. 170 study farms were visited by farm advisors. Practical information on the best practices were disseminated to farms by advisory visits, demonstrative events, guidance material and farmhouse meetings.

Source: INTERREG IVC project "LakeAdmin"

Actions aiming to improve regional policies for resource efficiency are also supported under Interreg Europe Programme. Since the launch of the Programme, 12 of the approved projects target resource efficiency and circular economy which illustrates the growing interest of Europe's regions to move in this direction. Several projects fall in the wider concept of resource efficiency, focusing on eco-innovation in tackling food waste (ECOWASTE 4 FOOD), the role of green public procurement (GPP4Growth) and nanoremediation as a low-cost and effective technique to clean up contaminated soil and water (TANIA).

4. The way forward

Regions and cities have numerous instruments and tools at hand to contribute to resource efficiency improvements. They can set clear framework conditions by drawing up long-term visions or strategies or more concrete action plans advocating resource efficiency. Cities and regions can also set good examples by integrating specific resource efficiency criteria in their public procurement procedures, contributing to substantial demand for sustainable solutions on the market. Regional governments can use various economic incentives encouraging sustainable resource use, such as targeted subsidies, loans as well as deductions, exclusions, or exemptions from a tax liability. Depending on the national institutional set-up they can also adopt supportive regulations, such as bans, requirements, licences to enable local action; or remove certain regulatory obstacles. The organization of awareness and education campaigns can also effectively contribute to more sustainable resource use of local and regional stakeholders. Furthermore, regional governments can ensure the regional coherence of municipal plans and measures; they can encourage inter-municipal and inter-regional cooperation on resource efficiency.

Regional level has also an important role to play in accelerating eco-innovation in businesses. Resource efficiency can also be included as one of the priorities in smart specialization strategies (S3)[6], orienting regional research and innovation efforts. Regional and local authorities also have a role in recognizing and overcoming lock-ins associated with inefficient resource use on regional and local scale, in order to ensure that economic activities in the region are more sustainable and future-proof.

The Interreg Europe Policy Learning Platforms stimulate knowledge exchange in four thematic areas, one of these is the Environment and Resource Efficiency Platform. Projects in the same family will be encouraged to learn from each other. To fine-tune the services and products of the Platforms to user needs, we encourage you to share your ideas with the relevant Platform managers and thematic experts. You will find their contact details here.

Sources of further information:

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#sustainable, #resources, #policy, #regionalauthorities, #localauthorities

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[6] http://ec.europa.eu/regional_policy/sources/docgener/informat/2014/smart_specialisation_en.pdf

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