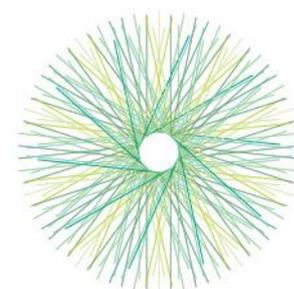


Press article

Circular economy

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Press article 500words

Opportunities for agriculture and forestry in the circular economy

Tomato grower and fish farmer create profits through water re-use and energy exchange

Circular economy places resource-efficiency at the centre of economic decision making and practice, ensuring added value and allowing resources to be re-used again and again. The European Commission launched its circular economy package on 2 December 2015, including ambitious challenges for agriculture and forestry. The Commission will take a series of actions. One of these concerns re-using treated waste water, including legislation on minimum requirements for water re-use. This can alleviate pressure on scarce natural resources. Re-using water in agriculture also contributes to nutrient recycling.

Ben Allen from the Institute for European Environmental Policy stresses: "The 'circular bio-economy' is one where farmers and foresters take a leading role in developing the bio-economy and making it more sustainable by integrating circular activities and natural cycles into existing and new practices." Johan Vlaemynck from Tomato Masters in Belgium thinks very highly of circular economy. His company reduced costs through more sustainable resource use and by making more of waste streams. Johan explains: "Together with the neighbouring fish farm Aqua4C we make optimum use of energy and nutrients by setting up a recirculating system with very low waste of water. The fish tank water is heated by heat from the combined heat and power system, and the pumps are also powered by electricity from the CHP installed at the tomato farm. The fish farm saves on production costs and we get a higher energy price. We are now setting up a water recycling system. The rainwater on the glasshouses can be used to fill the fish tanks. Afterwards, the water can be used to fertilise the tomato plants, saving us 25% on fertilisers. The fish farm would only need to evacuate 10% of its water." With this solution, the tomato company is more closely connected to Aqua4C, and they share the benefits of resource-efficient activities. Today Tomato Masters is involved in an experiment with a university to make boxes from leftover tomato branches. This will help to substantially reduce waste and close the loop.

The circular economy package includes developing quality standards for recycled nutrients. Their sustainable use in agriculture reduces the need for mineral-based fertilisers, which have negative environmental impacts, and dependence on imports of phosphate rock, a limited resource. Currently, the use of fertilisers based on recycled nutrients is hampered by rules, as well as by different quality and environmental standards across Member States. The Commission will propose a revision of the EU regulation on fertilisers, including the EU-wide recognition of organic and waste-based fertilisers, stimulating the sustainable development of an EU-wide market.

Like Johan, other farmers and foresters can start their own innovative resource-efficient project. EU Rural development programmes can support such projects in the form of **Operational Groups**, either at national or regional level. They can also participate in **multi-actor projects** across Europe under specific Horizon 2020 calls. Both form part of the European Innovation Partnership 'Agricultural Productivity and Sustainability' (EIP-AGRI).

Press article 250words

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Circular economy places resource-efficiency at the centre of economic decision making and practice, ensuring added value and allowing resources to be re-used again and again. The European Commission launched its circular economy package on 2 December 2015, including ambitious challenges for agriculture and forestry. The Commission will take a series of actions. The circular economy package includes developing quality standards for recycled nutrients as well as a proposal for a revision of the EU regulation on fertilisers. Another action concerns re-using treated waste water. Some agriculturists are already making the switch, such as Belgian horticulturist Johan Vlaemynck.

Johan Vlaemynck from Tomato Masters reduced costs through more sustainable resource use and by making more of waste streams. Johan explains: "Together with the neighbouring fish farm Aqua4C we make optimum use of energy and nutrients by setting up a recirculating system with very low waste of water. We are now setting up a water recycling system. With this new system we will save 25% on fertilisers and the fish farm would only need to evacuate 10% of its water."

Like Johan, farmers and foresters can start their own resource-efficient innovative project. EU Rural development programmes can support such projects in the form of [Operational Groups](#), either at national or regional level. They can also participate in [multi-actor projects](#) across Europe under specific Horizon 2020 calls. Both are part of the European Innovation Partnership 'Agricultural Productivity and Sustainability' (EIP-AGRI).

More information

Johan Vlaemynck was one of the speakers at the **EIP-AGRI Workshop 'Opportunities for Agriculture and Forestry in the Circular Economy'**.

Initiatives from across Europe presented at the event were:

- INTEGRASTE - Development of integrated agro-industrial waste management politics maximising materials recovery and energy exploitation in Western Greece
- Development of innovative processes for wood ash upcycling in Austria
- Bioconversion of organic waste streams such as hen and swine manure, waste of fish, coffee, vegetables and fruit by black soldier fly (*Hermetia*) in Belgium
- AgroHubs in Lapland, local networks in which waste and side streams are recycled / used as a source of local energy production
- Metsä Fibre bioproduct mill in Central Finland

[You can download all presentations on the event webpage.](#)

[Read the EIP-AGRI Circular Economy factsheet](#)

[Read the European Commission's circular economy package](#) (released 2 December 2015)

Circular economy in Horizon 2020

The European Commission is committed to supporting the transition towards a circular economy. Funding possibilities include €5.5 billion for waste management and €650 million under Horizon 2020.

A new EIP-AGRI brochure on Funding opportunities under Horizon 2020 - Calls 2017 is under preparation. The brochure will be launched early June 2016 and will include a list of calls related to circular economy.

One of the new Horizon 2020 calls relevant for the circular economy will open in October 2016. Topic **SFS-30-2017** under Sustainable Food Security deals with mitigating greenhouse gas emissions and environmental pollution – with a focus on carbon, nitrogen and phosphorus recycling in agro-ecosystems. This call includes the [multi-actor approach](#).

Background information

EIP-AGRI

The European Innovation Partnership 'Agricultural Productivity and Sustainability' (EIP-AGRI) is one of five EIPs which have been launched by the European Commission in a bid to promote rapid modernisation of the sectors concerned by stepping up innovation efforts. The EIP-AGRI aims to foster innovation in the agricultural and forestry sectors by bringing research and practice closer together – in research and innovation projects as well as via the EIP-AGRI network.

EIPs aim to streamline, simplify and better coordinate existing instruments and initiatives and complement them with actions where necessary. Two specific funding sources are particularly important for the EIP-AGRI: the EU Research and Innovation framework, Horizon 2020, as well as the EU Rural Development Policy.

EIP-AGRI Operational Groups

An Operational Group is a group of people who come together to work on concrete solutions to a practical problem or innovative opportunity and whose project is funded by the EU Rural Development policy. EU Rural development programmes can support the setting up and running of such projects in the form of Operational Groups, either at national or regional level. An Operational Group consists of several partners with a common interest in a specific, practical innovation project. The people involved in the Operational Group should bring in different types of practical, and where necessary, scientific expertise. They may include farmers, scientists, agri-business representatives and many others. Every country or region has the possibility to define specific national demands or restrictions on how to put together an Operational Group. Operational Groups form part of the European Innovation Partnership 'Agricultural Productivity and Sustainability' (EIP-AGRI).

Multi-actor projects under Horizon 2020

The new Horizon 2020 Work Programme 2016-2017 provides €371 million to 38 topics that respect the multi-actor approach (MAA) for agriculture, food and forestry projects. Proposals need to demonstrate that they are targeting actual needs of end users, and aim at demand-driven innovation. The reasoning behind the multi-actor approach is that the people who need the solutions can also help to shape them by being involved right from the start and throughout the whole project: from defining the questions to implementing research activities, and up to participating in demonstrations and dissemination. This cross-fertilisation of ideas between different actors with complementary knowledge (farmers and farmers' groups, advisers, enterprises, researchers and others) should lead to innovative solutions that are more likely to be applied in the field. Project results and practical recommendations should be presented in an easily understandable and accessible way. They should feed into the European Innovation Partnership for Agricultural Productivity and Sustainability (EIP-AGRI) for broad dissemination as 'practice abstracts'. This will also help to make the impact of researchers on practice more visible and measurable.

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