



CORE Organic

Coordination of European Transnational Research in Organic Food and Farming Systems

About

The CORE Organic network developed over five different programme periods: CORE Organic I (2004-2007); CORE Organic II (2010-2013); CORE Organic Plus (2013-2018); CORE Organic Cofound (2016-2022), and presently as CORE Organic Pleiades from 1 September 2022 until 2026.

The CO Pleiades network consists of 21 European ministries and research councils funding research in organic food and farming on transnational level since, and 12 stakeholder partners representing the organic sector. The network is encompassing 26 countries/ regions from Europe and Mediterranean. Since its start in 2004, the network is coordinated by the International Centre for Research in Organic Food Systems (ICROFS, DK).

CORE Organic Pleiades aims to ensure policy exchange in the relevant areas for organic food and farming research among the network members. The relevant network objectives are set by European Green Deal (2019) that has specific targets of at least 25% of EU agricultural land to be farmed organically until 2030 and continuous growth of the sector; together with EU Organic Action Plan (2021) supporting coordination of national organic food R&I programmes via Horizon Europe mission in the area of soil health and food, and partnerships on agroecology and food systems. The latter is of particular importance as organic food and farming research should be funding in the future through European Partnerships on Agroecology and Sustainable Food Systems (FutureFoodS).

Objective and aim

The objective of CORE Organic is to improve the knowledge basis and innovation capacity necessary for supporting further development of organic food and farming as a way to respond to significant societal challenges in Europe's agriculture and food systems.

The main focus of the CORE Organic network is to join forces and fund transnational research projects supporting a focused and coordinated research and innovation effort covering the most important challenges along the organic value chains. The objective of CO is the enhancement of the European research area (ERA) on organic agriculture with a more efficient use of research funds and with a higher impact of research on the organic sector's development.

CORE Organic aims at supporting the development of a larger and more sustainable organic food system, including farming practices, processing and innovative value chains, with the purpose of fulfilling the growing demand for organic products, subsequently supporting health, trade and job creation. In pursuing these objectives, the CO network also contributes to the improvement of the general competitiveness of European agriculture and to the development of innovative solutions for environmentally-friendly agriculture for Europe and the world. Since 2004, CORE Organic supported 8 transnational calls with 62 research projects selected for 61.9 M EUR.

Challenges

Organic agriculture is considered to be one of the important development pathways towards more sustainable agriculture and food production. This development has been and will be dependent on



continuous research and innovation. The topic of organic research as ERA-Net was proposed by the sector itself. As 'organic' was an under-researched theme, but economically growing sector, it was an opportunity to strengthen its innovation capacity also in terms of job growth policies. .. New information and new technologies are required for the further expansion of the sector, and research on organic farming and processing methods is necessary.

CORE Organic wants to link the national research programmes and to avoid unnecessary duplication of research. Additionally, it aims to reflect the growing market for organic and be a driver for innovation and for knowledge underpinning new regulations. CORE Organic is strong in delivering on sector relevant demands and beyond. Moreover, organic is at the core of the transition towards sustainable food systems, which are climate proofed, healthy nutrition focussed and circular.

Scope, goals and research topics

The scope of CORE Organic concerns research along the entire organic production and value chain, from producer to consumer.

Specific topics include:

Circular Bioeconomy

- Sustainable and efficient management of nutrients and use of secondary fertilisers;
- Sustainable and efficient organic cycles and renewable resources;
- Resource-efficient, circular, and zero-waste food system.

The future organic consumer

- Innovative marketing strategies and local markets;
- Supporting the development of organic markets.

Fruit, vegetables and viticulture

- Increased yield of organic fruit, vegetable, and viticulture production;
- Innovative pest and weed management;
- Improved soil fertility in organic fruit, vegetable, and viticulture production.

Mixed farming, food systems and landscapes

- Designing robust and productive cropping systems at field, farm, and landscape levels;
- Diversity in food from field to plate;
- Mixed farming systems and diversification.

Human health

- Quality and safety of organic food along the whole value and processing chains;
- Processing concepts and technologies to ensure food quality and sustainability;
- Mild food processing.

Crop production

• Plant-soil interaction in organic crop production;



- Functional biodiversity to improve management of diseases, weeds, and pests;
- Ecological support in specialised and intensive plant production systems.

Nature and biodiversity

- Improvement of production efficiency and agricultural biodiversity within cropping systems by using eco-compatible breeding techniques;
- Enhanced biodiversity and fertility, and reduced carbon footprint

Pigs

- Management systems to allow natural behaviour and improve welfare
- Animal disease and parasite management, including preventive and health improvement therapies to reduce reliance on antibiotics
- Robust and competitive management and production systems for pigs

Chicken

- Innovative production and management systems to improve animal welfare and reduce environmental impacts
- Eco-efficient production and use of animal feed at the local level

Cattle

- Improved animal welfare regarding feed, barn, pasture and use of medication
- Eco-efficient production and use of animal feed at the local level
 Appropriate and robust livestock systems

CO's goals in organic research go beyond the mere adoption of effective farming practices and include:

- The development of more sustainable organic processing and value chains
- The capability to effectively fulfil the growing demand for organic products
- The improvement of trade conditions and job creation in the organic sector
- The development of more advanced and tailored organic regulation and support measures
- The wider ecological and social consequences of producing and distributing food and other primary products

Working towards the Code of Practice (CoP) for organic food processors in order to overcome the lack of mandatory standards for organic food processing at the EU level.

