

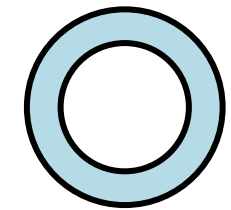
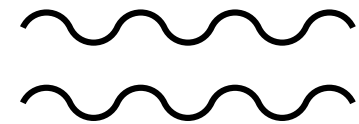
The Evolution of the Concept of Economics in relation to Agroecology

Dr. Noelia Parajuá

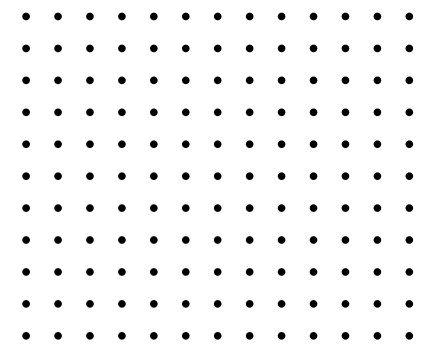


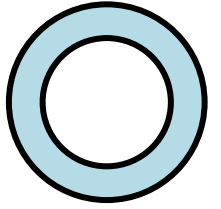
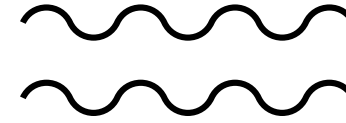
Webinar
Economics & Agroecology

22 June 2026

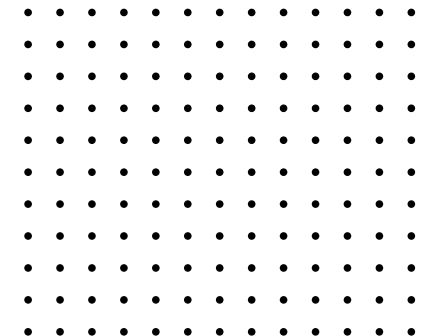


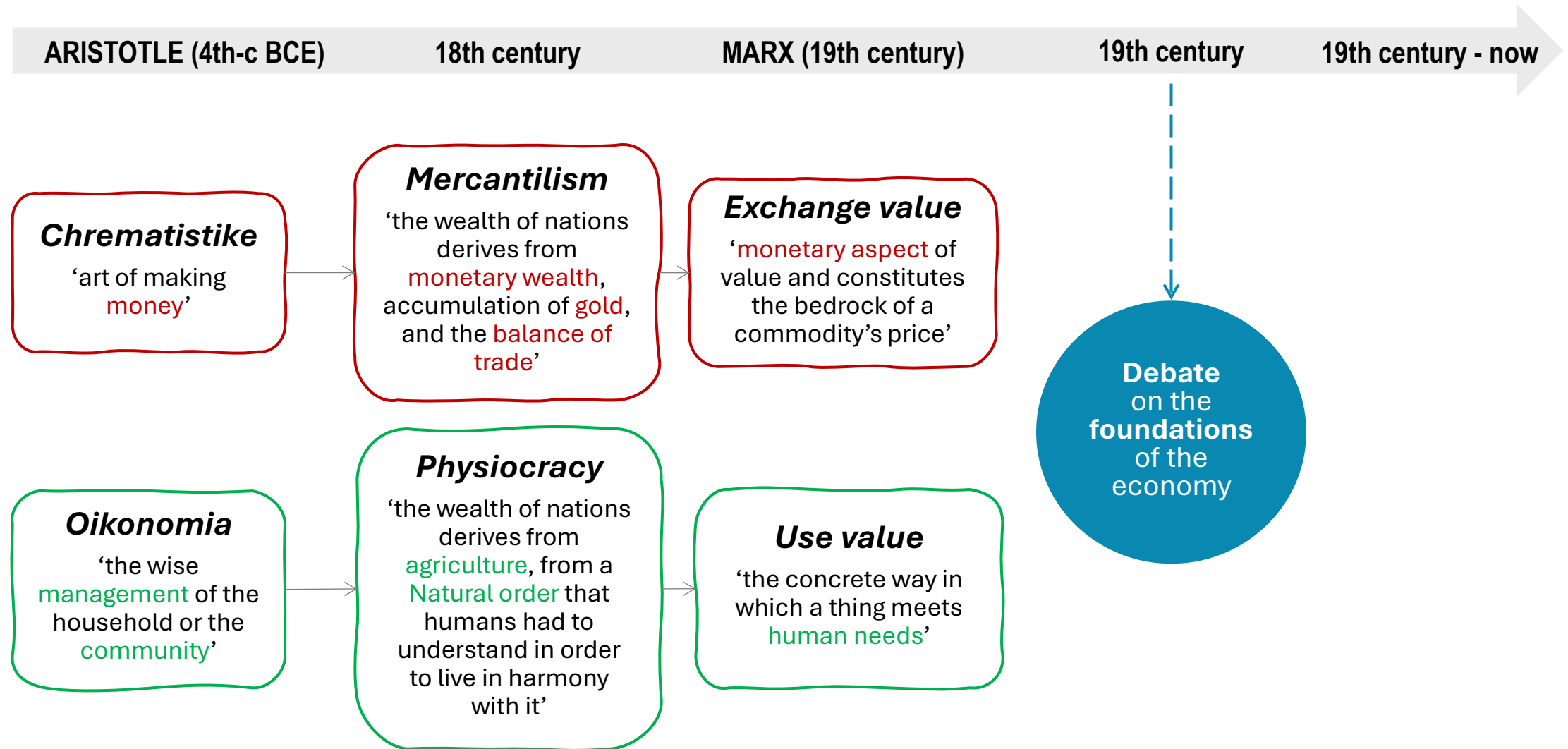
What is Economics about?

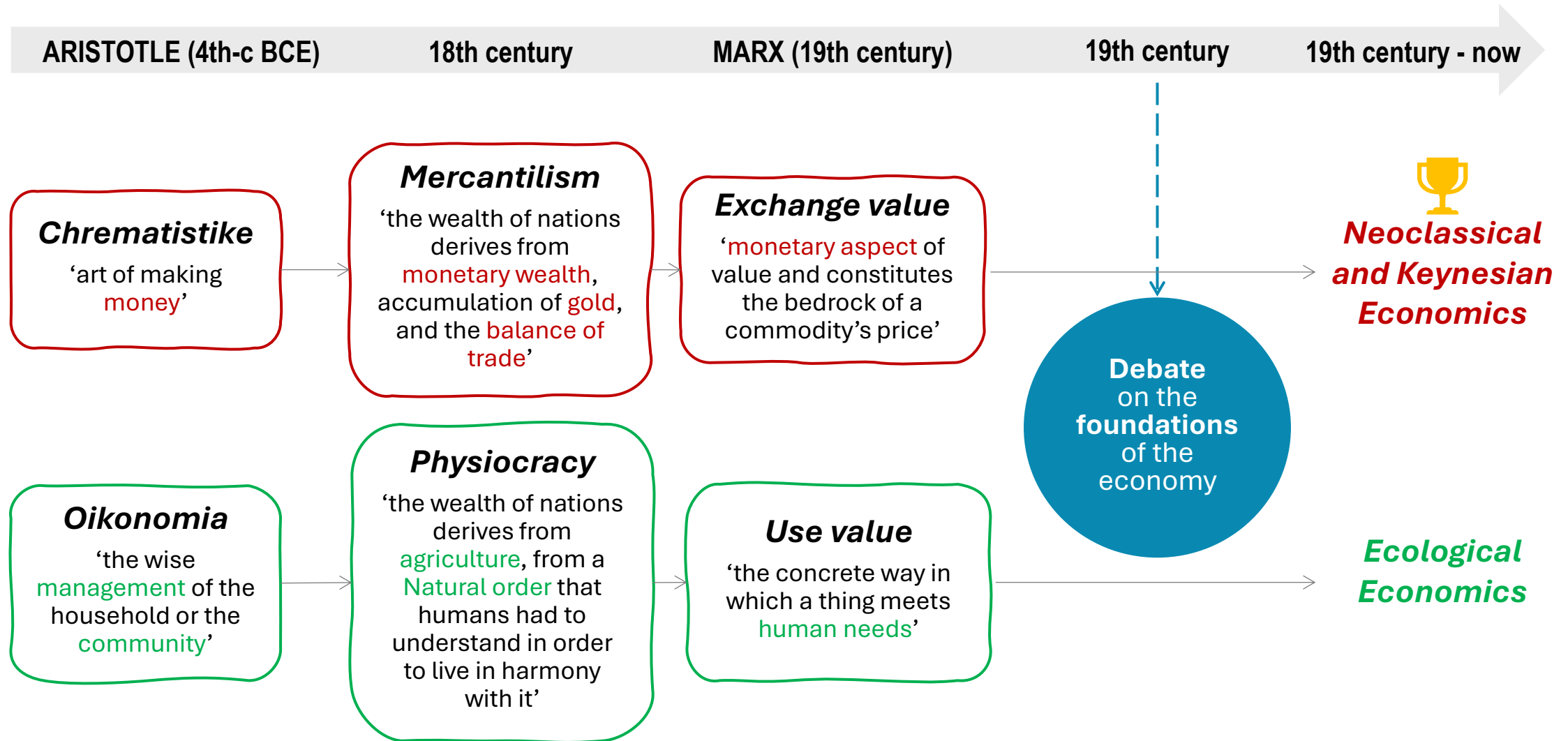


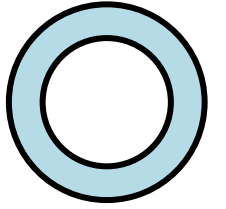
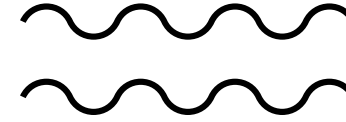


- **How did we get here?** I will track the **evolution** of the understanding of the **economy**—that is, the way the economy has been framed and addressed—, and how **Economics**, once it emerged as an autonomous discipline in the 18th century, has done so
- What are the **implications** of this evolution, particularly in current times and for Agroecology?









Formal Economics

Neoclassic and Keynesian Economics

Single unit of account:
exchange value (prices)

Focus on the **market**

The economy is an isolated system in
which abstract exchange value circulate
between firms and households

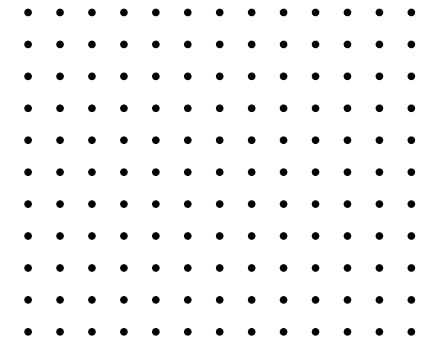
Substantive Economics

Ecological Economics

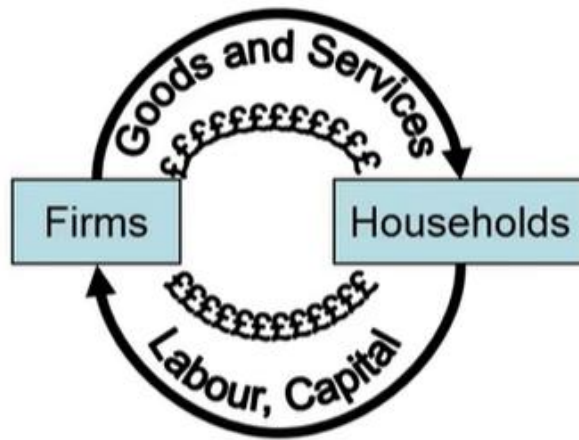
Multiple units of account
(biological, chemical, physical...)

Beyond the market

The economy is a subsystem of the
biosphere; all economic activity requires
resources and produces waste

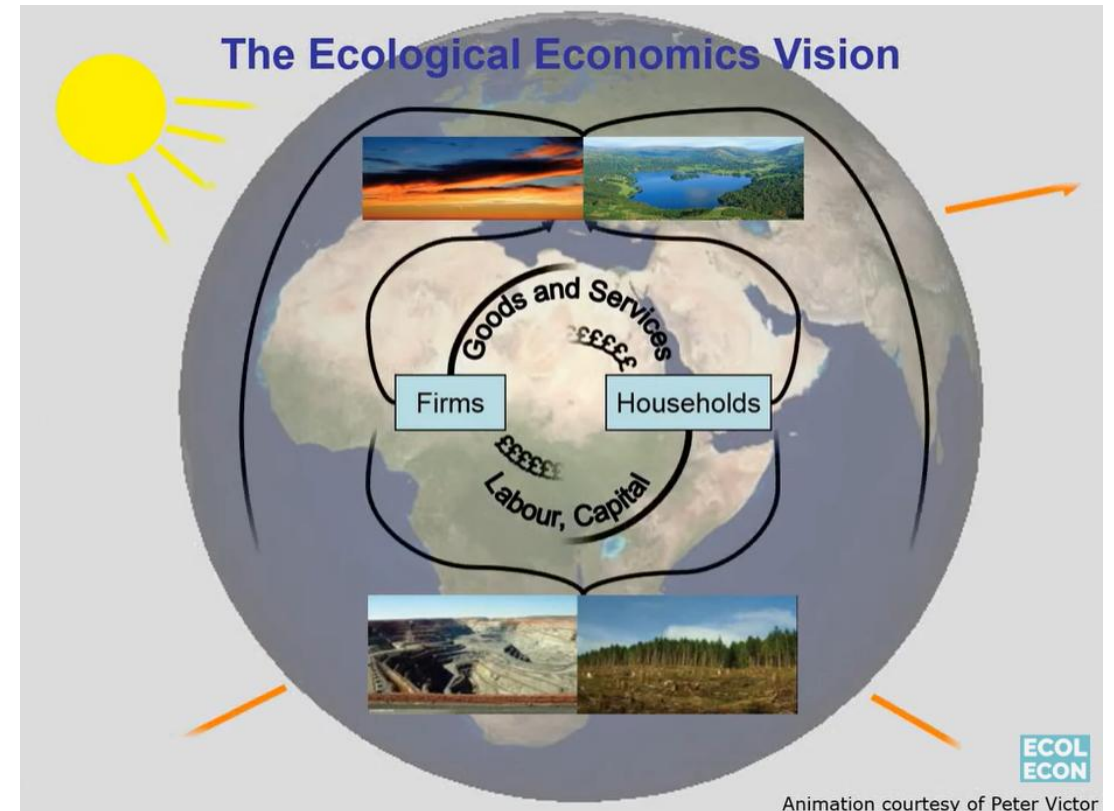


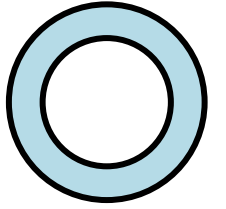
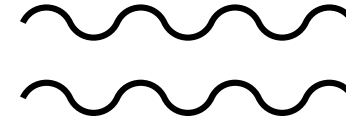
The Neoclassic Economics vision



(Where is the environment in this picture?)

The Ecological Economics vision



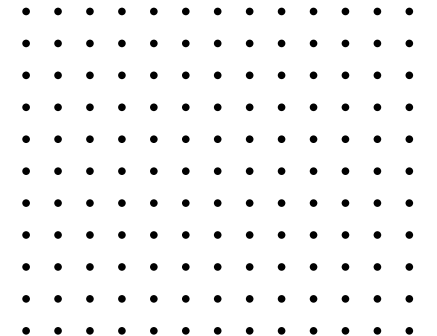


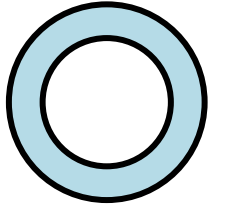
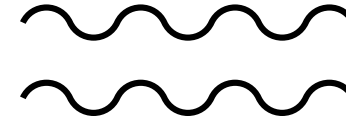
Profitability, productivity, efficiency... may look very different

The productivity of a given agricultural activity can be measured as:

$$\frac{\text{money obtained (€)}}{\text{money invested (€)}}$$

$$\frac{\text{energy obtained (J)}}{\text{money invested (J)}}$$

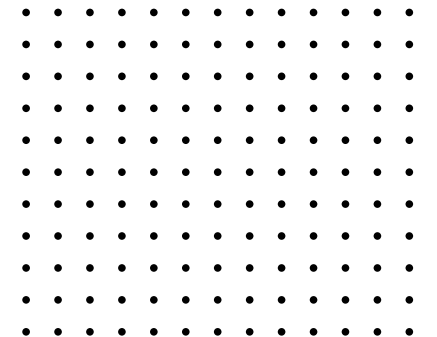


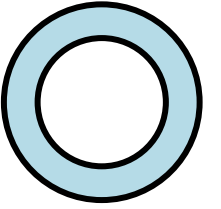
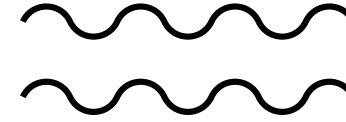


Ecological Economics: not only *flows*, but also *funds*

Fund elements are «dissipative structures that use inputs to transform them into goods, services, and waste, i.e., into outputs, within a given time scale; they remain constant during the dissipative process (Scheidel and Sorman, 2012)»

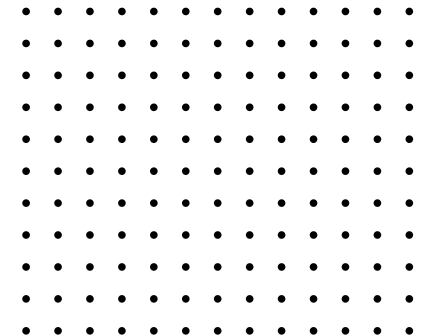
└─→ Examples: **soil, biodiversity, livestock, farmers...**



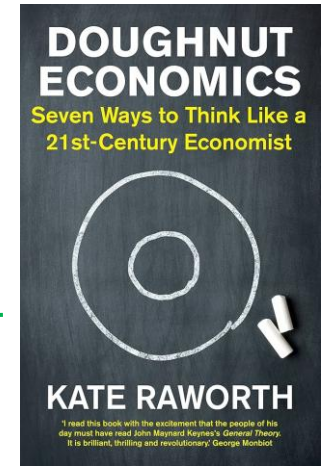
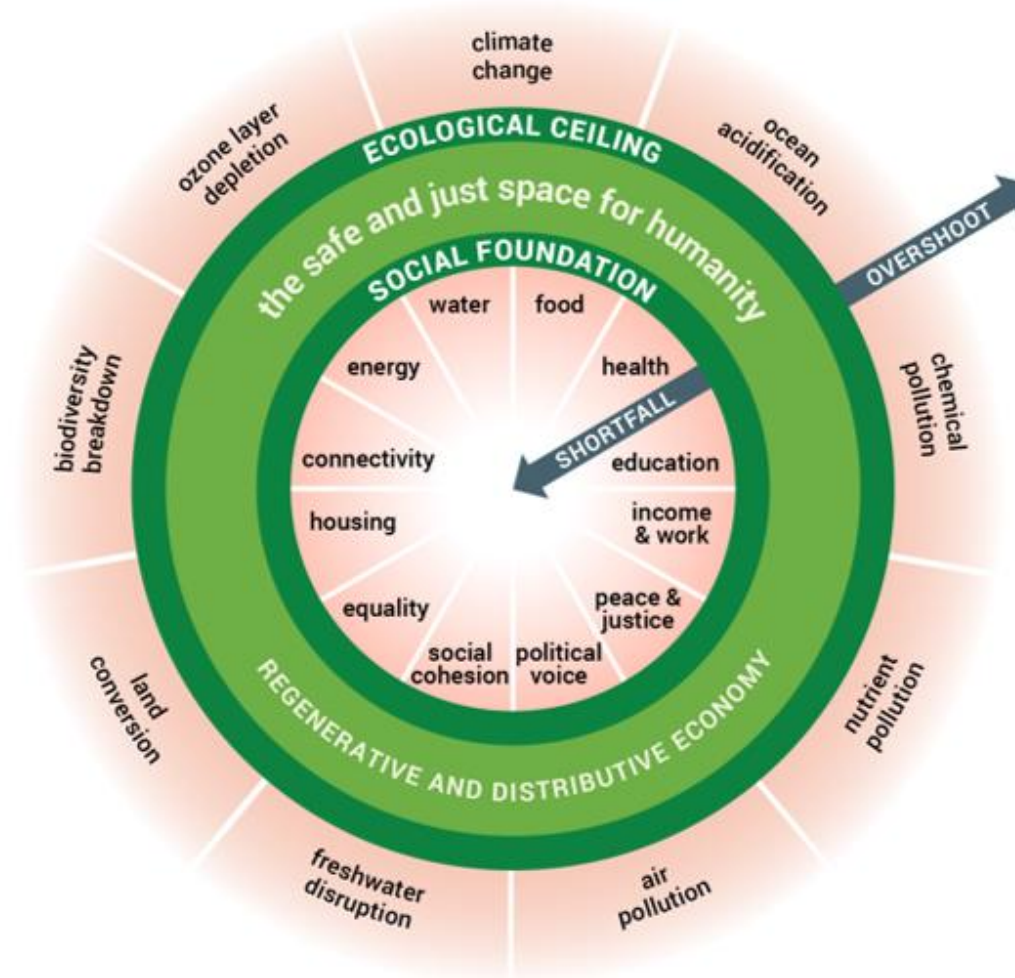


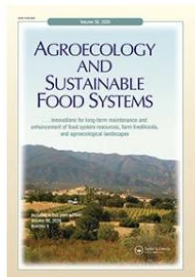
Agroecology would greatly benefit from a substantive understanding of Economics—as is the case in Ecological Economics

We need to bring a substantive foundation back into Economics!



Policy-making implications





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Research Article

Financial outcomes of organic and conventional farms in Spain (2015–2021). An agroecological perspective

Josep MA Argilés-Bosch , Noelia Parajuá, José Luis Martínez, Mercè Bernardo, Manuel González de Molina & Enric Tello

DOI: 10.1080/21683565.2026.2660105

Published online: 19 Apr 2026



Objective

We analyze the financial performance of organic, partially organic, conventional, and transitioning-to-organic farms in Spain between 2015 and 2021.



Model and sample

We conduct a multivariate statistical analysis of 62,588 farm-year observations from the Spanish Farm Accountancy Data Network (FADN).

Argilés-Bosch, J. M., Parajuá, N., Martínez, J. L., Bernardo, M., González de Molina, M., & Tello, E. (2026). **Financial outcomes of organic and conventional farms in Spain (2015–2021). An agroecological perspective.** *Agroecology and Sustainable Food Systems*, 1–32.
<https://doi.org/10.1080/21683565.2026.2660105>



Results

The **financial performance** indicators for return on assets (ROA), income per family labor, and other indicators, **were consistently higher or similar in organic farms** compared with conventional ones, with even stronger outcomes for partially organic farms.

These results hold for matched subsamples—**crop farming, livestock farming, and mixed crop-livestock farming**.

The financial performance of organic and partially organic farms remains above that of conventional farms even when **subsidies** are excluded.



Conclusions

In this paper we provide **statistically significant, robust and conclusive results** showing that Spanish farmers who were organic—and even more so those who certified only part of their production—obtained financial performances clearly superior to those who practiced conventional management

These findings suggest that distinct farm models, cost structures, and trading strategies make **organic farms more resilient and profitable**, offering insights for agricultural sciences, policy, and public debate.



Thank you!

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