

AgrifoodTEF

The European Testing and Experimentation Facilities for Agrifood Innovation

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What does TEF mean?

Testing and Experimentation Facilities

Network **infrastructures**, both physical and virtual, for the **validation** of **products and services** for the **agrifood sector** applying **Artificial Intelligence or robotics**.

Existing TEF initiatives



TEF - Health



AgrifoodTEF



AI - Matters



CitCom.ai



AgrifoodTEF

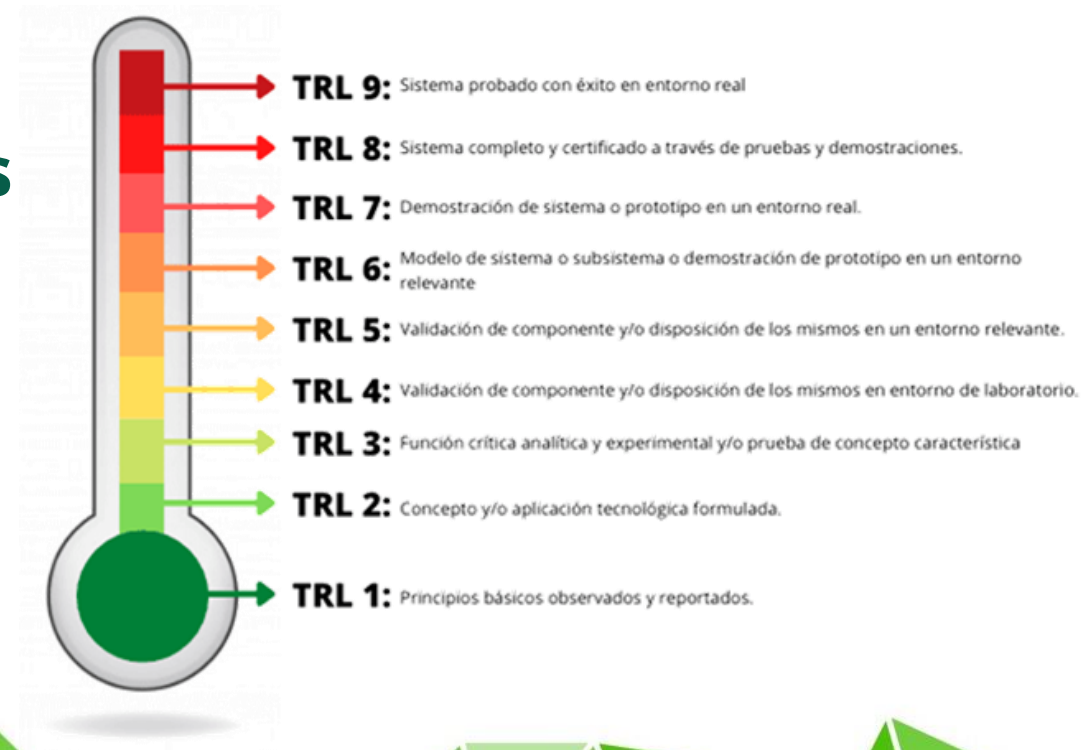
Europe's largest project
focused on Artificial
Intelligence and Robotics
within the agri-food sector

€60M, 9 countries, 31 partners



Recipients of AgrifoodTEF services

- **Technology providers** interested in **validating** their **products or services** for the **agri-food sector** based on **Artificial Intelligence or robotics**
 - Technological maturity between TRL 6 and TRL 8
- Large companies, but especially **SMEs**: 100% service cost funding



AgrifoodTEF Spain

5 Million €

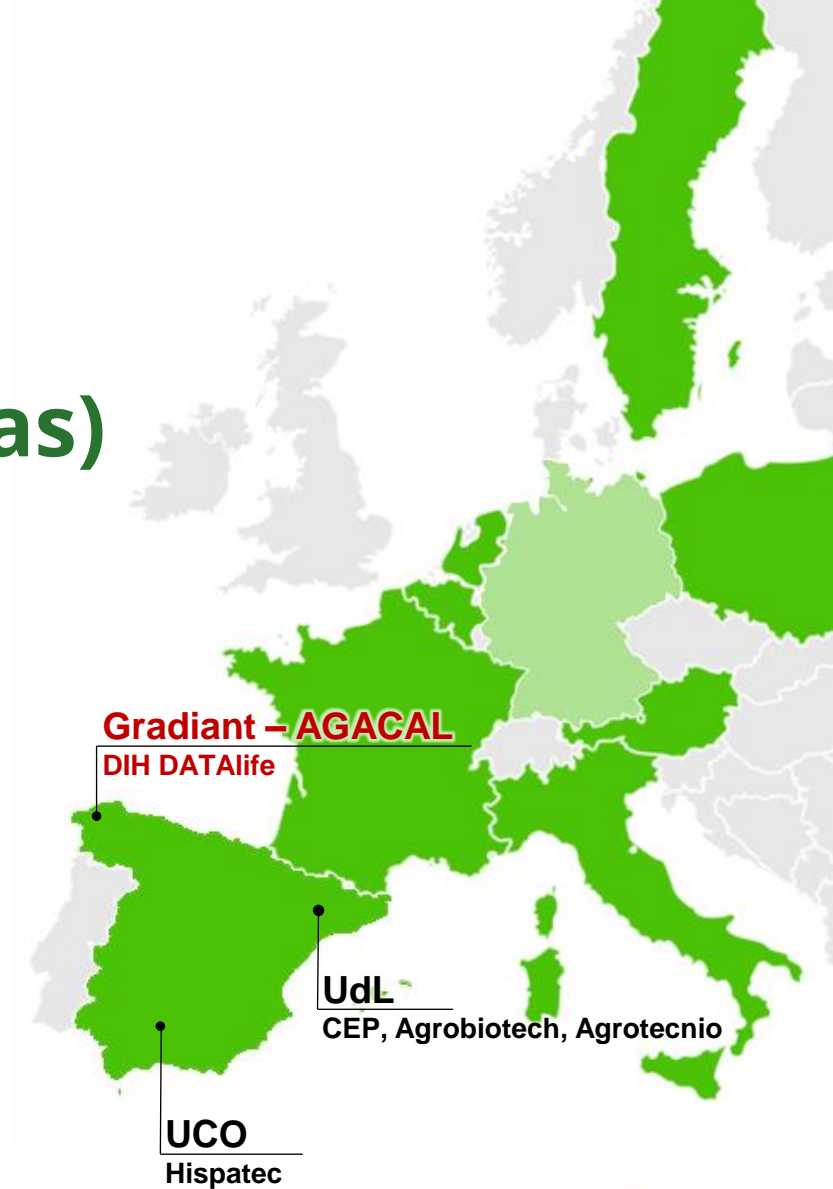
Co-funded by the European Commission through the Digital Europe Programme and the Ministry of Agriculture, Fisheries and Food of Spain



AgrifoodTEF Spain (9 partners, 3 areas)

Northwest

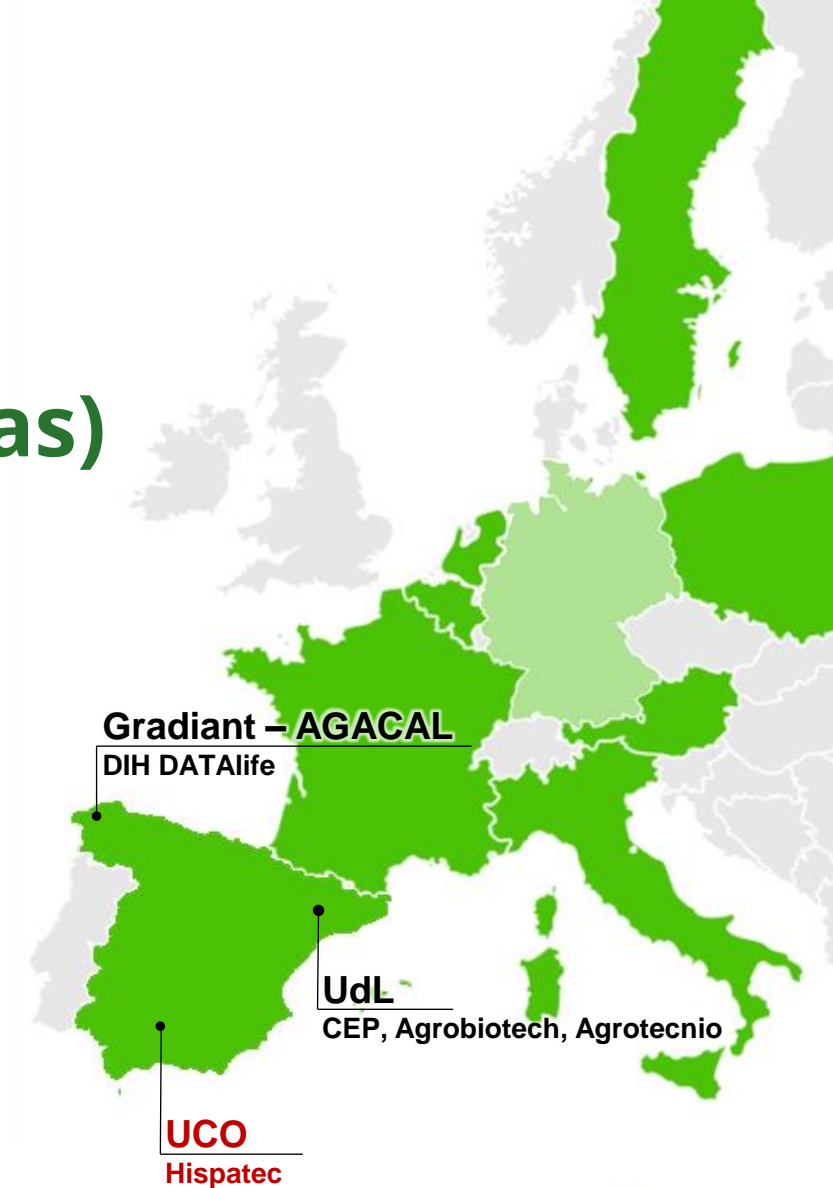
- **Partners:**
 - **Gradiant**, RTO
 - **AGACAL**, Galician Agency for Food Quality
 - **DATALife**, EDIH
- **Focus:** forage production and dairy sector



AgrifoodTEF Spain (9 partners, 3 areas)

South

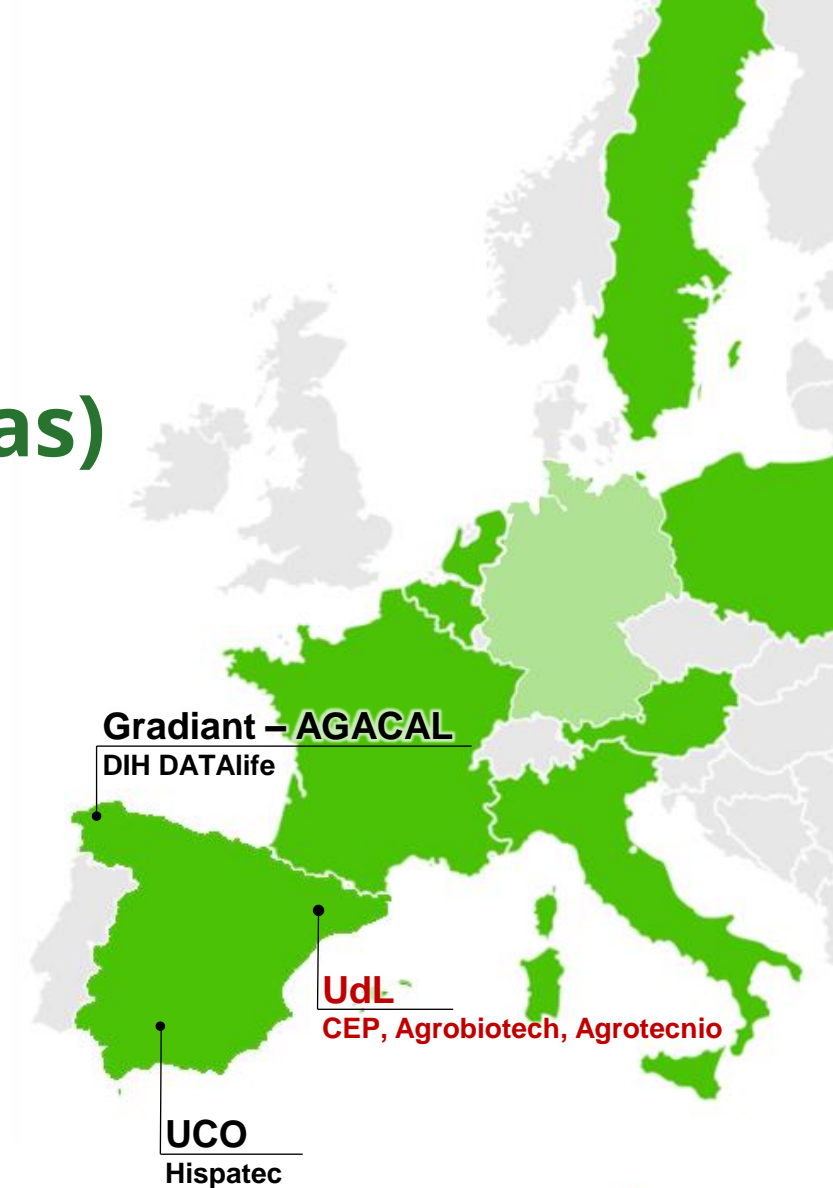
- **Partners:**
 - **Universidad de Córdoba**
 - **Hispatec**, agritech company
- **Focus:** arable crops, horticulture and fruit trees, extensive livestock farming and the food industry



AgrifoodTEF Spain (9 partners, 3 areas)

Northeast

- **Partners:**
 - **Universitat de Lleida**
 - **CEP**, experimental pig farm
 - **Agrotecnio**, research center
 - **Agrobiotech**, business and technology park
- **Focus:** pig sector, fruit growing and agrifood data spaces



Infrastructures

Northeast Area





Experimental pig farm

- Precision feeding machines
- Cameras
- Sensors for environmental conditions
 - Temperature, humidity, CO₂, ammonia,...





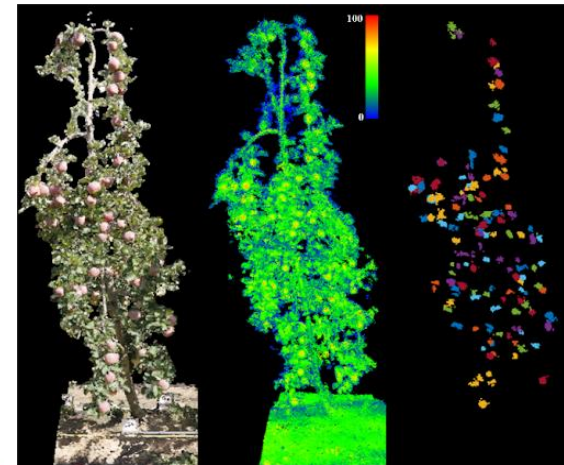
Agroliving Lab co-creation space

- Front office, connect area SMEs with AgrifoodTEF
- Space to co-create technological solutions for sectoral challenges
- Advice, training, networking, workshops
- ...



Precision Agriculture Lab

- Sensors for soil and crop characterization
- Precision agriculture equipment
- Precision phytosanitary applicators and variable sprayers
- ...



Food Processing Pilot Plant

- Industrial kitchen
- Pasteurization and sterilization systems
- Non-thermal processing technologies
 - Electrical, ultrasound, light pulses,...
- Vegetable proteins extruder
- ...





Universitat de Lleida

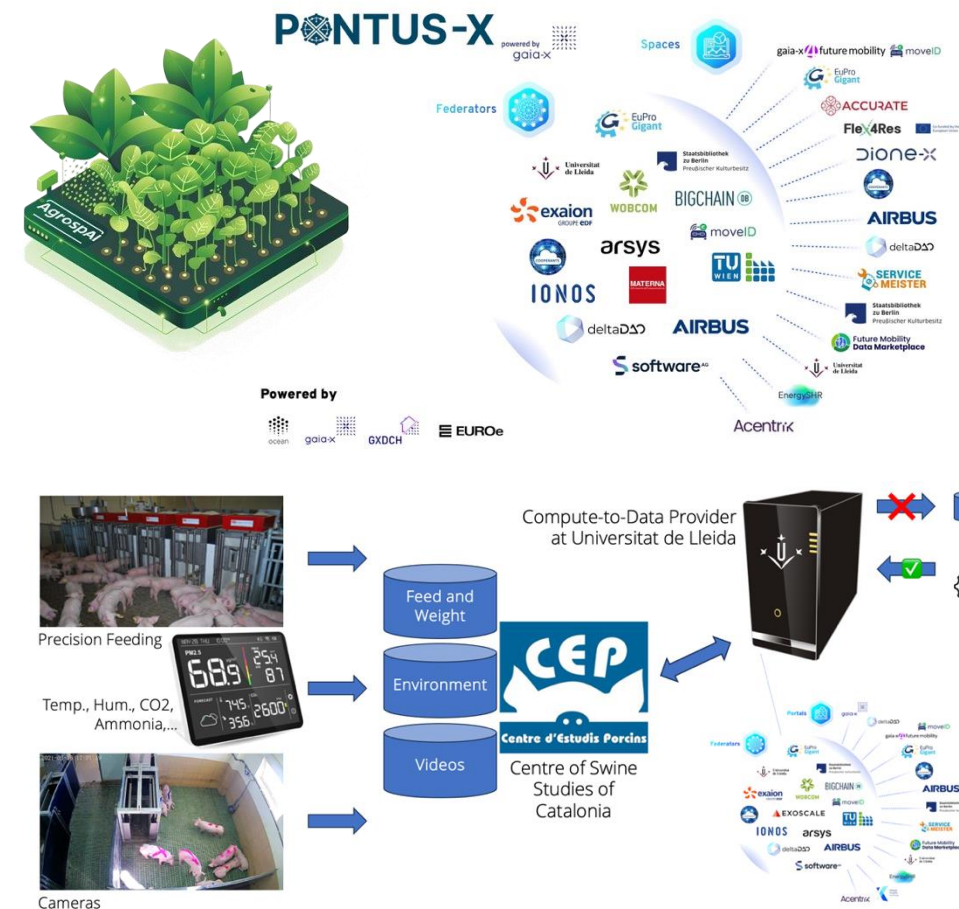
USABILILAB.

- User eXperience (UX) of interactive products and services
 - Web pages, mobile applications, ... agricultural machinery
- Usability and accessibility evaluation
- Value Sensitive Design



AgrospAI

- Agrifood data space for sovereign data sharing and Artificial Intelligence services
 - Based on Gaia-X Pontus-X
 - Being applied in the pig sector





Cofinanciado por
la Unión Europea



Services being provided

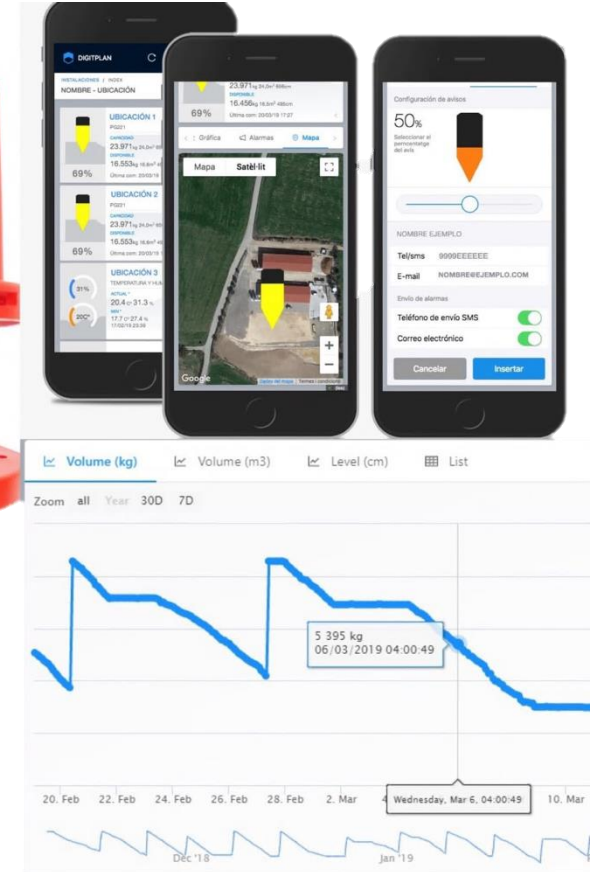
Northeast Area





Measurement and monitoring systems

- **AI/Robotics Product/Service**
 - SILOMETRIC, Laser device for measuring silos feed in real time
- **AgrifoodTEF Validation**
 - Validation of intelligent software to improve the signal in real conditions at the Centre for Swine Studies (CEP) to improve reliability





Equipment for pig production

- **AI/Robotics Product/Service**

- DOSITRONIC, Intelligent feeding system for feed dosing

- **AgrifoodTEF Validation**

- Comparative evaluation with traditional methods of reducing consumption while maintaining productivity





Optimization of the use of
phytosanitary products, reducing
use while maintaining efficacy

- **AI/Robotics Product/Service**

- Adaptable dosing kit with
computer vision

- **AgrifoodTEF Validation**

- Dosing efficiency in controlled
environments in vineyards and
woody crops



Microfy.AI

AI-POWERED AUTOMATED MICROSCOPY

Automated digital microscopes
with Artificial Intelligence

- **AI/Robotics Product/Service**
 - Fungi.AI, Cell count of fungi and their growth rate
- **AgrifoodTEF Validation**
 - Expert Cell Count and Measurement Validation
 - User Experience Assessment

 **Fungi.AI**
AI - POWERED FUNGI GROWTH ANALYSIS



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Thanks for your attention, questions?

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