



## TECHNICAL MEETING OF THEMATIC PARTNERSHIP “TRACEABILITY AND BIG DATA”

Smart Specialization Platform S3P Agrifood

H2020 and regional projects and  
activities matching Specific Focus 1  
running in Emilia Romagna region

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# PILOT PROJECT IDEAS

- 1) ENVIRONMENTAL CONDITIONS ANALYTICS AND THEIR IMPACT ON RISK ASSESSMENT AND LIFECYCLE
  - mobility information and product localization
  - environment conditions monitoring and product risk assessment
  - self-assessment diagnosis tools for environmental footprint sustainability
- 2) DOING MORE WITH LESS
  - smart data analysis to reduce use of natural resources, water consumption and to fight the loss of bio-diversity in soils.
- 3) Territory-basis scenarios of eco-innovative interventions and marketing



A case study.....

# INTERREG MEDITERRANEAN PROJECT





Project co-financed by the European Regional Development Fund



## PEFMED

**Uptake of the Product Environmental Footprint across the MED agrofood regional productive systems to enhance innovation and market value**

*A territorial-based approach to agrofood sustainability*



Italian national agency for new technologies,  
energy and sustainable economic development





## PEFMED Objectives



Project time frame: **from 1/11/2016 to 31/4/2019**

Following the results of the **pilots performed by EC in 2014-2015**, the overall objective of PEFMED project is **to test the applicability of the new EU Product Environmental Footprint method (PEF)** for some specific product groups in **9 MED agrofood regional systems (clusters & supply chains)**, with the final aim of:

- **promote targeted systemic ecoinnovation interventions** to green the agrofood sector;
- **increase the market value** of PEF-compliant productions;
- support the **Smart Specialization Strategies (RIS3)** goals related to innovation in agrofood & industrial production.

PEFMED represents the 1st verification in Europe of the PEF standards **within given territorial domains**.

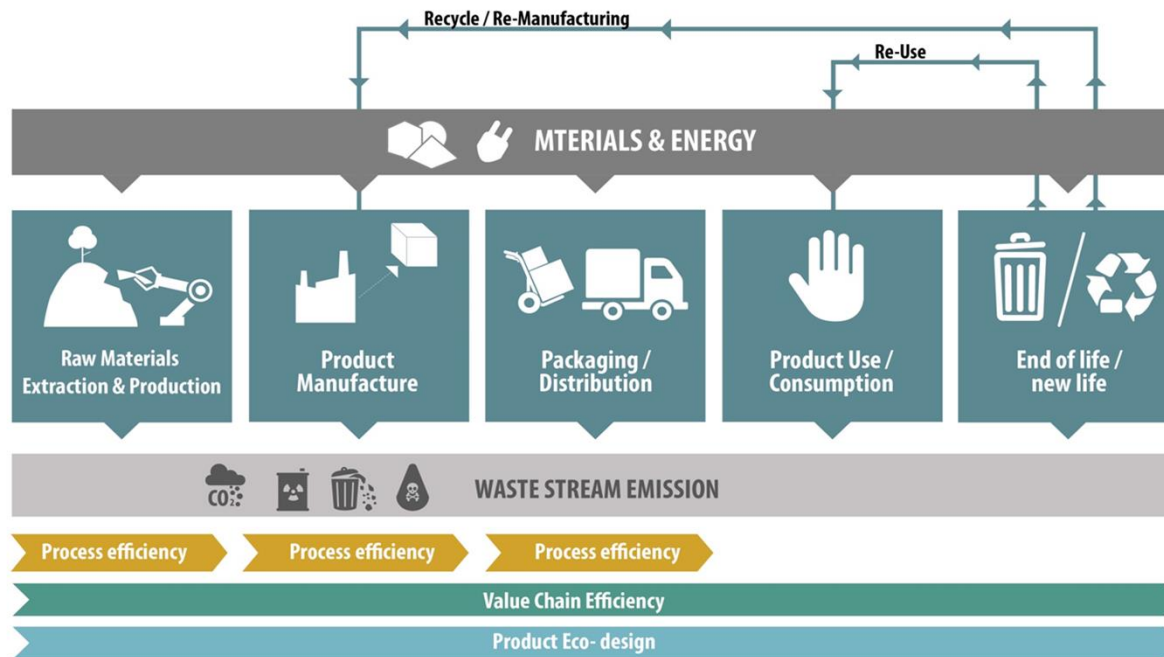
It strengthens connection & cooperation **by providing a set of technology, organizative & market intelligence drivers**, to guide a mind-change in traditional agrofood productions model towards PEF-compliant measures.



## European Product Environmental Footprint (PEF)

- Methodology for the quantification of the environmental footprint of products
- Based on existing methods and standards **(Life Cycle Assessment, LCA)**
- It covers a broad range of environmental impact indicators
- Based on **PEFCR - Product Environmental Footprint Category Rules**: “Product category specific, life-cycle-based rules that complement general methodological guidance for PEF studies by providing further specification at the level of a specific product category.”

If we consider just the production phase we underestimate the pollution generated by a product. Using the holistic approach of LCA we do not allow the shifting of impacts from a phase to another and from an environmental compartment to another



## EXPECTED OUTCOMES

- Definition of a **PEFMED method** (PEF requirements+ environmental /socio economic territory based indicators)
- **9 LCA studies** performed according the PEFMED method **in specific regional agrofood clusters / supply chains**, to measure distance-to-target from EC environmental standards (*benchmarks* already identified at EC level)
- **LCA- based stress tests reports** delivered for the pilot agrofood productive systems.
- Development of **territory-based PEF self-assessment diagnosis tools** (in all partners languages+EN)
- **Territory-basis scenarios of eco-innovative interventions**, for greening the supply chains and to reduce environmental costs in food processing (for “*worst in class products*”)
- **Marketing strategies** for mainstreaming economic, social and environmental sustainability into the Organisation Governance and Management Systems (for “*best in class products*”)
- **Transnational methodology** to extend the PEFMED use outside the tested regions.
- **National roadmaps** for environmental footprint sustainability in MED productions





# Regional projects and other activities



# Intelligent Transport System and Smart Labels: from the Origin to the Dinner Table

**THE OBJECTIVE.** Dynamic managing and UMTS applications for:

- mobility information and product localization;
- environment conditions monitoring and product risk assessment along the transportation.

Production and treatment of the data to a higher scale to automatically identify products that have been exposed to adverse and potentially dangerous conditions, products whose transportation has not followed precise directives, and to automatically trace each product along the line of transportation.

# Non-competitive use of natural resources and consuming reduction

## THE OBJECTIVE:

- identify the correct techniques, both hardware and software, analyze resources' consumption;
- identify, via smart data analysis, strategies to fight the loss of bio-diversity in soils, reduce the use of herbicides, water consumption, and pollution substances emission in water and air.



For more information:

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