MISSION

To boost the competitiveness of biopolymers developed in Spain through collaboration on innovation, training, dissemination and exploitation of results.

The goal is for the use of polymers from renewable sources to account for more than 5% of the total in Spain by 2030.

The success of the MARFIL Network mission will therefore make a strong contribution to reducing dependence on oil, recovering agricultural byproducts (thus helping reduce depopulation in rural areas) and limiting the amount of waste that goes to landfill without recovery of any kind.

PARTNERS:

AIMPLAS PLASTICS TECHNOLOGY CENTRE

aitiip centro tecnológico

Gaiker MEMBER OF BASQUE RESEARCH & TECHNOLOGY ALLIANCE

Cidaut

FUNDED BY:

GOBIERNO DE ESPAÑA · MINISTERIO DE CIENCIA, INNOVACIÓN Y UNIVERSIDADES

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Plan de Recuperación, Transformación y Resiliencia

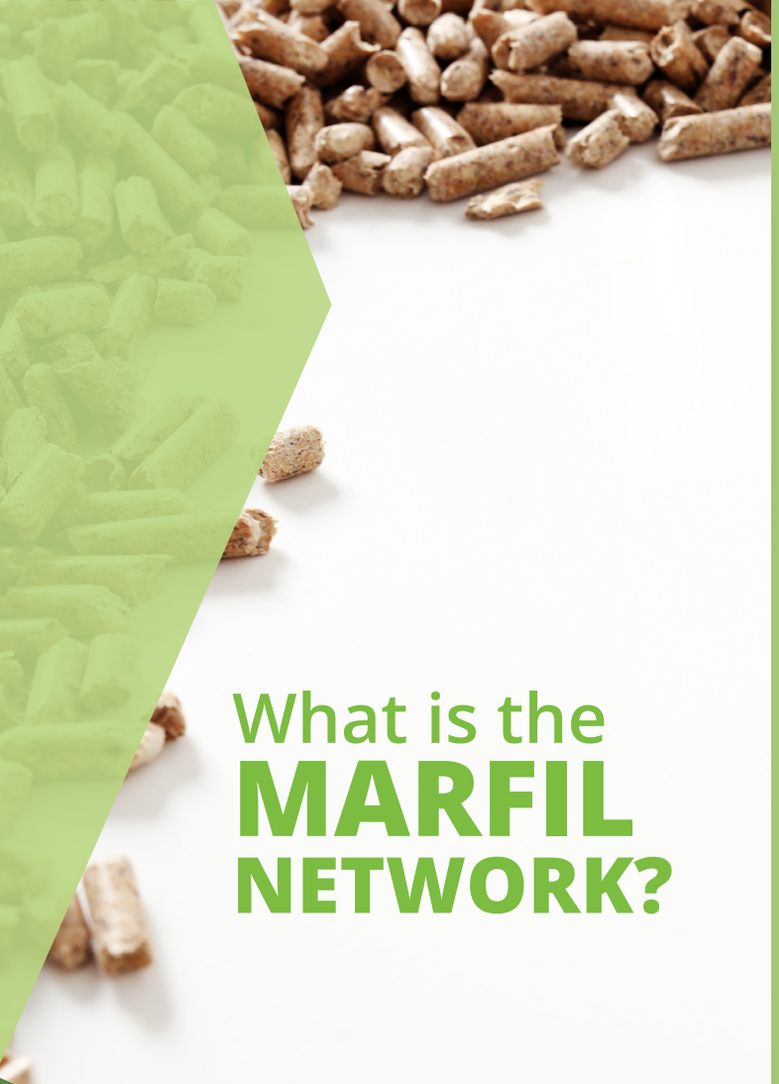
CDTI INNOVACIÓN

The MARFIL project forms part of the 2023 Cervera call for Technology Centres of Excellence announced by the Ministry of Science, Innovation and Universities, and funded with European funds from the Recovery, Transformation and Resilience Plan.

The programme is managed by the Centre for the Technological and Innovation Development (CDTI).

RED MARFIL

DEVELOPMENT OF RENEWABLE-SOURCE POLYMERS WITH ENHANCED PROPERTIES FOR APPLICATION IN HIGH-CONSUMING AND VALUE-ADDED INDUSTRIAL SECTORS



What is the MARFIL NETWORK?

The MARFIL Network, made up of AIMPLAS, AITIIP, CIDAUT and GAIKER, is a multidisciplinary team of four technology centres with advanced skills in the development of biopolymers and raw materials from sources other than petroleum that have a lower environmental impact and are more easily recyclable and/or biodegradable.

The network will develop a strategic programme for research, development, innovation and training focused on strengthening these skills for development of bio-based raw materials, mainly from waste, agro-industrial byproducts and alternative biomass, to significantly increase their use in applications where they are the best environmental, technical and economic option.

The skills acquired will be disseminated at different levels to promote collaboration with leading research groups, increase industry interest in the development of sustainable raw materials and products, attract talent and raise awareness of the environmental advantages of bioplastics for use in packaging applications requiring food safety, more lightweight components for the transport sector and improved agricultural practices that ensure supply chain resilience.

VISION

To convert a wide range of biomass and other agro-industrial waste into biopolymers that can be used to manufacture products in different industrial sectors thanks to new technological developments that are more sustainable and profitable.

Work will be carried out in three main lines:

- Sustainable and scalable treatments of agro-industrial biomass to produce biopolymers, additives and reinforcements.
- Improving their properties and processing capacity through new bioplastic polymerization techniques.
- Increasing their compostability and/or recyclability.