

PROJECT

EDWIM

Advancing sustainable manufacturing for wind power

EDWIM aims to develop and demonstrate innovative manufacturing solutions for two of the most critical elements of modern wind turbines: gearbox ring gears and generator stators.

zabala INNOVATION

Funded by the European Union

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12	6	€7M	48
PARTNERS	COUNTRIES	TOTAL BUDGET	MONTHS

edwim

IN ONE CLICK		
Coordinator	**Programme**	**Period**
IKERLAN	Horizon Europe	2026-2030
Sector	**Web**	
Wind Energy	www.edwim.eu	

01
Challenge

Europe's wind energy industry needs to scale up production while remaining competitive. However, manufacturing critical wind turbine components such as gearbox ring gears and generator stators still relies on energy- and resource-intensive processes, manual operations and hazardous materials. These limitations increase production time and costs, generate waste and emissions, and affect working conditions and component reliability.

02
Solution

EDWIM aims to develop more sustainable, digitalised and efficient manufacturing processes for gearbox ring gears and generator stators. Advanced manufacturing technologies and automation will be combined with simulation models, Digital Twins and AI-driven Recommendation Systems to optimise production and quality control. The solutions will be demonstrated in two industrial pilot lines under real operating conditions.

03
Impacts

By reducing manufacturing costs, extending turbine reliability and increasing process sustainability, EDWIM contributes directly to the EU Green Deal, the Industrial Strategy and the Strategic Energy Technology (SET) Plan. The project will reinforce Europe's leadership in clean, digitalized manufacturing, set new standards for advanced production, and enhance the competitiveness of the European wind energy supply chain against global competitors.