

Interregional partnership for Smart Specialisation on **SUSTAINABLE BUILDINGS**



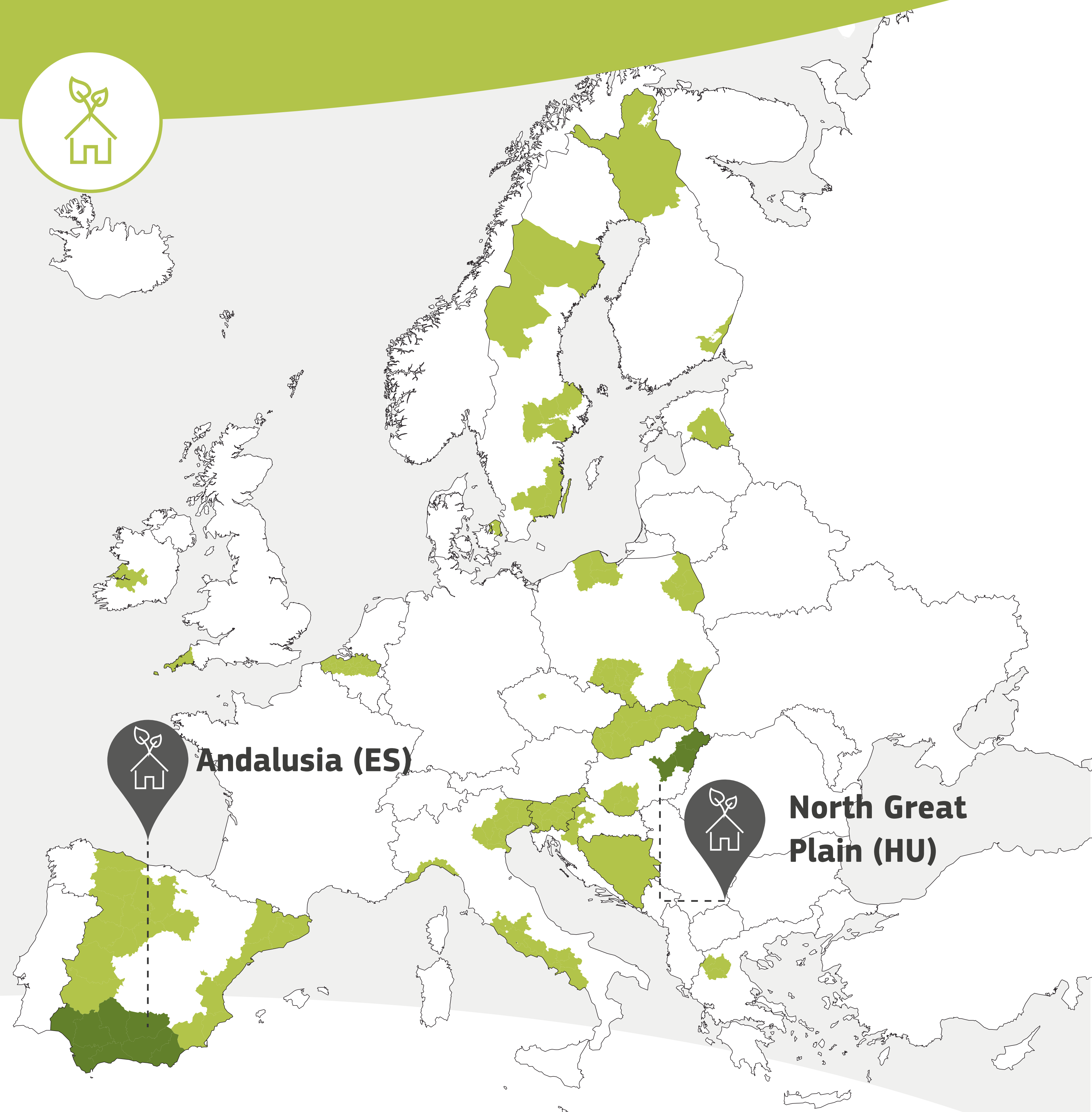
Leaders

Led by **Andalusia (ES)**
and **North Great Plain (HU)**,
the partnership engages the
participation of

43 REGIONS AND
MEMBER STATES

The EU institutions encourage
regional cooperation as the ideal way
to take advantage of the regional
capacities.

Regions and EU share a long term
commitment focused particularly on
decarbonising the energy system in
the EU by 2050



Reference topics

The Sustainable Buildings partnership works on the following reference topics:



Eco-construction, bioclimatism and insulation of buildings

- New materials** with low carbon footprint
- Innovative constructive processes:** light prefabrication of low-cost housing, advanced manufacturing for new construction elements
- Bioclimatic solutions** based on green bio elements (in roofs, etc.)



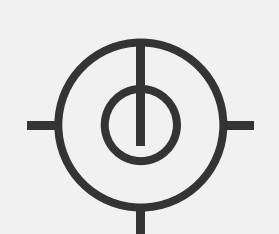
Renewable energy integration in buildings

- Climatisation** with renewable energies
- Self-consumption** and energy storage
- Low cost solutions** aimed at vulnerable groups



Systems of maximum energy efficiency in buildings and cities

- Innovative solutions for **high energy efficiency:** evaporative cooling, LED lighting, microgeneration, etc.
- Smart energy management** systems and **Internet of Things (IoT)**
- Advanced solutions for **energy rehabilitation** of historical heritage buildings



Key factors

1 Energy and environment

The building sector is the largest energy consumer in Europe, amounting to **40% of the total EU consumption** and 36% of CO₂ emissions



2 Innovation

High innovation potential through innovative solutions of **maximum energy efficiency**, ecomaterials, or renewable energy installations

3 Employment and Industry

The construction industry generates about **9% of European GDP** and accounts for 18 million direct jobs.



Construction activities that include renovation work and energy retrofits add almost twice as much value as the construction of new buildings. SMEs contribute more than **70% of the value** added in the EU building sector

4 EU and Regional Collaboration

The decisive commitment of the EU to improve the energy efficiency of the building stock is highlighted by the reformulation of the energy regulatory framework within the framework of the Clean Energy for All Europeans strategy



SmartSpecialisation
@S3Platform

Joint
Research
Centre

