Line of research Materials and Sustainability (M&S)

- PV-driven CO2 capture for cleaner power production (Carlos Ortiz Domínguez)
- Thermocatalytic recomposición of biogas into hydrogen over heteroatom-doped carbon materials (Juan Carlos Serrano Ruiz)
- Dark engineering: the role of PVD in highly stressed mechanical systems (José Luis Endrino Armenteros)
- Computational design of materials for new batteries (Francisco de Paula Montero Chacón)
- Design of new materials for thermal energy storage using simulation techniques (Francisco de Paula Montero Chacón, José Luis Endrino Armenteros)
- Development of multiphysics-multiscale simulation platforms for the design of materials and components in sustainable application (Francisco de Paula Montero Chacón)
- Development of an optimized control algorithm for hydrogen fuel cell systems (José Javier Brey Sánchez)
- Optimization of a low-temperature electrolyzer for green hydrogen production (José Javier Brey Sánchez)
- Modelling and validation of a high-temperature electrolysis-based green hydrogen production system (José Javier Brey Sánch