

Pedro Juan Royo

CURRICULUM VITAE

Phone (+44) 0774 7807041 | Email pedro.juan.royo@gmail.com | GitHub Parzival1918 | LinkedIn

Address Joan Miró 7, 1r 2a, 08005, Barcelona, Spain

A PhD student in the Day group at the University of Southampton. Highly independent worker, and I am up to tackle any challenge.

EXPERIENCE

THE UNIVERSITY OF SHEFFIELD, DEPARTMENT OF MATERIALS SCIENCE & ENGINEERING

Sheffield, UK

Intern

June 2020 - July 2020

- Analyzed the impedance response of BaTiO₃ under different conditions using COMSOL. Found interesting relations between the aspect ratio of the grains of the material with its impedance response.
- Developed MATLAB code to analyse the results and create visualisations.
- This work was presented at the **WorldCUR-BCUR 2023 Conference** in the University of Warwick.

INSTITUT CATALÀ DE NANOCIÈNCIA I NANOTECNOLOGIA (ICN2)

Barcelona, Catalonia

Intern

July 2019 - August 2019

- Created **core-shell silica-polystyrene nanoparticles** to study the effects of nano-plastics on living tissue.
- Learned how to **independently work on a lab**.

SKILLS

- **Languages:** Catalan (Native), Spanish (Native), English (Professional working skills), French (Speaking and writing skills).
- **Tools:** Ansys, Solid Edge, Git, LaTeX, COMSOL, Jupyter Notebook, Graphpad Prism 9, Typst, PostgreSQL.
- **Coding:** Python, MATLAB, Rust

EDUCATION

- **PhD student** / University of Southampton / 2024 - Now
 - Developed the skills to carry out independent work, and manage a project.
- **MEng Materials Science and Engineering (Research stream)** / The University of Sheffield / 2020 - 2024

ACHIEVEMENTS

SHEFFIELD METALLURGICAL AND ENGINEERING ASSOCIATION HATFIELD MEMORIAL PRIZE IN METALLURGY

Sheffield, UK

Prize August 2022

- Prize awarded once annually for the best examination performance by a second-year undergraduate studying for a Bachelor or Master of Engineering degree in either Metal or Materials Science and Engineering.

SIR HAROLD WEST AWARD

Sheffield, UK

Prize July 2021

- Given due to **personal and academic performance during level 1 of the Materials Science and Engineering degree** in The University of Sheffield. Awarded to only 8 students of the Engineering department.

CiMs-CELLEX Scholarship

Barcelona, Catalonia

May 2018

- **Obtained one of the 24 positions of the competitive CiMs-Cellex scholarship** to course International Baccalaureate in Aula Escola Europea.

HP CODEWARS SANT CUGAT Competition

Sant Cugat, Catalonia

Competition 2017

- **Ranked 1st** in a coding competition organised by HP.

PROJECTS

PERSONAL WEBSITE

Self-motivated September 2025

- Coded a **small personal website using Jekyll**. Hosted using Github Pages. Access it here: naujordep.com.

HOUSE STYLE FILE FOR LATEX

Self-motivated March 2022

- **Made a style file to be used in LaTeX** to format documents in accordance to the guidelines of the Materials Science department in University of Sheffield, adopted by the department once completed.