



# PhD student\_CADENCE / Catalytic Dual-Function Devices Against Cancer (H2020 nº GA 742684)

---

• ORGANISATION/COMPANY UNIVERSIDAD DE ZARAGOZA	30/10/2018 17:00 - Europe/Madrid	• HOURS PER WEEK 37.5
• RESEARCH FIELD Computational modeling	• LOCATION Spain › Zaragoza	• EU RESEARCH FRAMEWORK PROGRAMME H2020 / ERC
• RESEARCHER PROFILE First Stage Researcher (R1)	• TYPE OF CONTRACT Temporary	• REFERENCE NUMBER 742684
• APPLICATION DEADLINE (PROVISIONAL)	• JOB STATUS Full-time	

---

- Development of reaction-diffusion equations to simulate the behavior and activation of nanoparticles.
- Numerical development of glucose transport models.
- Simulation of tumour behaviour and experimental validation with in-vitro and in-vivo experiments.
- Numerical implementation of simulation of poroelastic behavior of tumor spheroids.
- Elaboration of summary reports and presentations (English preferentially).
- Preparation of scientific works and periodic reports.
- International mobility for collaboration in different research tasks.

#### Offer requirements

- REQUIRED EDUCATION LEVEL  
Computer Science or Applied Mathematics : Master Degree or equivalent  
OR  
Mechanical, Biomedical or Chemical Engineering: Master Degree or equivalent

#### Specific skill requirements

- Programming (C++, C and Python)
- Data analysis and representation (Paraview, matplotlib, MatLab)
- Basic knowledge of the mechanical and chemical bases of biological processes
- Basic knowledge as user of Finite Element softwares (Abaqus, Ansys, Comsol)

#### How to apply:

CV submission or further inquiries to Dr. Jose M. García Aznar ([jmgaraz@unizar.es](mailto:jmgaraz@unizar.es))

Provisional Deadline: December 23<sup>th</sup> 2018