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**Area Advanced Materials for Energy**

**Area leader:** Prof. Joan Ramon Morante

**Group:** Functional Nanomaterials Group

**Group leader:** Prof. ICREA Andreu Cabot

**Position:** Leading Researcher (R4) – Energy Storage

The Advanced Materials for Energy Area of IREC announces a Leading Researcher position in the field of Functional Nanomaterials for Energy Technologies.

**Description**

The candidate will lead a Research Group within the Advanced Materials for Energy Area of IREC devoted to the design and engineering of nanomaterials for energy-related applications, with particular emphasis on the fields based in the use of functional nanomaterials such as thermoelectricity, advanced solar energy conversion, catalysis, electrochemical reactions, etc....

The candidate will lead a multi-disciplinary team, coordinating research activities as part of international projects or projects with industrial partners, including multi-partners project. Likewise, the candidate will be also involved in tasks such as managing, writing, supervising and leading projects as well as in performing research in projects related to the use of functional nanomaterials. The candidate should be used to plan resources and ensure deadlines as well of reporting and communication of technical / research results and supervise a team of PhDs and PostDoc researchers involved on different research projects on the field.

Candidates must have:

- Expertise in the field of functional nanomaterials synthesis and characterization.
- Expertise in the application of functional nanomaterials in energy technologies, including thermoelectricity, electrocatalysis and batteries
- Capacity for leading nano energy activities and new initiative in the field.
- Large previous experience as principal investigator in European, National and Industrial Projects.
- A PhD degree in Chemistry, Physics, Material Science or equivalent
- Previous experience as PhD supervisor, having directed at least 15 PhD thesis in the last 10 years.
- Well international recognition on the base of citations and an ample record of scientific publications in the requested field of activities.

**Requirements**

We are looking for a leader with proven independent research experience, high creativity and remarkable communication skills.

**Essential:**

-The candidate has to fulfill the minimum requirements for the R4 researchers at IREC under scientific career:

- ✓ Have a large recognized number of publications in indexed scientific journals and / or books indexed with ISBN (as corresponding or first author)

- ✓ As a result of the work developed in the previous stage, it must have participated as a researcher, in R & D projects that total an amount of, at least, 2,200,000 euros
- ✓ As a result of the work carried out during the previous stage, it must have led R + D + i projects as the principal investigator of an aggregate budget of projects of 1,800,000 euros.
- ✓ Have participated, at least as a member of the research team, in 5 projects to provide value-added services to companies
- ✓ Hold, at least, 3 patent applications in the last five years
- ✓ Have participated in R + D + i projects in cooperation with other international institutions with funding obtained from the European Commission.
- ✓ Have conducted at least 6 doctoral theses.
- ✓ Proven services to the Scientific Community including editorial boards in indexed journals or participation in evaluation committees in competitive international calls.
  - PhD degree with specific focus on the energy applications.
  - Broad research view and proven capability for funding attraction (at regional, national and international level)
  - More than 10 years of experience as a leading (independent) researcher in the field
  - More than 20 years of experience on scientific research focused / related on materials and devices for energy applications.
  - Strong and broad international collaboration network on the field of energy (academy and industry)
  - Strong and long track record on scientific journals with high impact factor and consolidated citation attraction.
  - Strong international dimension in the field: long track record on invited/keynote talks in international congresses, participation in editorial boards of indexed journals, organization of international congresses, representative in international associations, international evaluator, etc.
  - Consolidated participation in EU and international research projects in the last ten years, with proven experience as a coordinator.
  - Proven experience in funding attraction (as Principal Investigator). At least 10M€ in the last 10 years both from competitive calls and private companies.
  - Experience on supervising Researchers, Postdoctoral researcher and PhD students (supervisor of, at least, 10 postdoctoral and 6 pre-doctoral researchers, in the last ten years).
  - Author of more than 5 patents or other Intellectual property rights related with the energy technology sector.

- Proven activity on dissemination and outreach activities in the energy field.
- Fluent English, Catalan and Spanish are essential

**Valuable:**

- PhD in the field
- Proven experience as a group leader (management of people)
- Proven experience in management of budgets above 1M€/year
- Grantee of the European Research Council Programme (or other similar groundbreaking research programs)
- Proven experience in transferring research results to industry.
- Awards due to scientific or professional activity.
- Proven mentoring of highly qualified researchers.

**Proposed Jury:**

President	Titular	Joan Ramon Morante
Vocal 1	Titular	Pere Lluís Cabot
Vocal 2	Titular	A.Perez-Rodriguez

More information about the selection process in:

**CALL AND REGULATORY BASES OF THE SELECTION PROCESS BY COMPETITION FOR THE RECRUITMENT OF LABOR PERSONNEL 2021/ CONVOCATÒRIA I BASES REGULADORES DEL PROCÉS DE SELECCIÓ PER A LA CONTRACTACIÓ DE PERSONAL LABORAL 2021**