Reference: 2022_003_BPD_CTA-AMB

A competition is open for the attribution of 1 PostDoctoral grant in the framework of the Project Sustainable antifouling agents: from grape wastes to the sea with the green chemistry leading the way, reference PTDC/CTA-AMB/0853/2021, within the R&D Institution CIIMAR (Interdisciplinary Centre of Marine and Environmental Research), supported by FCT, according to the following conditions:

1. Scientific area: Chemistry

2. Admission requirements: The candidate must accomplish the following requisites:
   - A PhD in the field of Organic Chemistry or Chemical Engineering, obtained in the three years prior to the application submission date*;
   - Expertise in organic synthesis
   - Candidates should speak and write fluently Portuguese and English.

Preferred conditions are previous experience in scalability and/or knowledge in designing greener products and processes.

* The scholarship can only be awarded if the post-doctoral research is carried out in a host entity different from the entity where the research work that led to the award of the doctoral degree was carried out; and if the scholarship holder does not exceed, with the conclusion of the scholarship contract in question, including the possible renewals, an accumulated period of three years in this type of grant, consecutive or interpolated.

In the event the doctorate degree was awarded by a foreign higher education institution, said degree must comply with the provisions of Decree-Law no. 66/2018 of 16th August until the signature of the contract.

3. Work plan: In CIIMAR, some promising nature-inspired antifouling compounds were synthesized by bioprospection of known marine antifouling compounds and were found to be harmless than commercial antifoulants. Marine coatings containing these derivatives, were highly effective in preventing the adherence of mussels larvae. This proof of concept addresses investing now in optimization of the synthetic procedures. The synthesis must be adapted to obey the Twelve Principles of Green Chemistry, namely use of eco-friendly solvents, replacement of hazardous reagents, prevent waste. Scalability of the methods must now be taken into consideration. Therefore, the candidate will be involved in Task 2 (Chemical synthesis) of the project. The main aim of this Task is the optimization of the synthesis of these recently discovered nature-inspired antifouling compounds with greener and scalable methods.

Regulations for Studentships and Fellowships of the Fundação para a Ciência e a Tecnologia, I.P. —and CIIMAR Grants Regulation approved by FCT.

5. **Work place**: The work will be carried out at FFUP, Rua Viterbo Ferreira (Grupo de Produtos Naturais e Química Medicinal - CIIMAR), under the scientific supervision of Prof Marta Ramos Pinto Correia da Silva Carvalho Guerra.

6. **Duration of the contract**: Duration of 12 months, starting in September 2022, under the regime of exclusive dedication.

7. **Monthly salary**: The monthly maintenance allowance is € 1686,00, in agreement with the monthly maintenance stipend table of the grants directly attributed by FCT, I.P. within the country ([https://www.fct.pt/apoios/bolsas/valores.phtml.en](https://www.fct.pt/apoios/bolsas/valores.phtml.en)). Payment will be made monthly by bank transfer. In addition to this allowance, the grantee will be covered by personal accident insurance.

8. **Selection methods**: The ranking of candidates will be performed by an initial evaluation based on a global Curriculum Vitae evaluation.

The candidates’ CV score (CVS) will be the sum of the evaluation for the Academic Qualification (AQ) and the Professional Experience (PE), in accordance with the formula:

\[
\text{CVS} = \text{AQ} + \text{PE}
\]

The Academic Qualification (AQ) and the Professional Experience (PE) will evaluate the merit of the candidate, and are evaluated with the following subcriteria:

**AQ. Overall assessment of the curriculum** - will have a weighting of 50% and will evaluate the following sub-factors:

- Topic of the PhD degree (25%)
- Scientific publications in the field of the admission requirements (15%)
- Oral communications in scientific meetings / national and international congresses and awards (10%)

**PE - Expertise / skills in the field of research indicated** - will have a weighting of 50% and will evaluate the following subfactors:

- Laboratory experience in the synthesis of organic compounds (heterocyclic compounds) and in structure elucidation (mono- and bi-dimensional NMR, mass spectrometry, Infrared, and UV-Vis) (20%)
- Laboratory experience in greener methodologies for synthesis and purification of organic compounds (heterocyclic compounds) (15%)
- Laboratory experience in the scalability of chemical synthesis (15%)
Short-listed candidates with the similar highest final scores may be invited to an interview, having a maximum weight of 10% of the total evaluation. The interview will be used to clarify aspects related to the candidate’s motivation.

The jury reserves the right to not assign the research grant if none of the candidates meets all requirements and matches the desired profile with a minimum of 15 values of the total evaluation.

9. Composition of the jury selection:
President of the jury: Marta Ramos Pinto Correia da Silva Carvalho Guerra
Vogal: Professora Doutora Honorina de Matos Cidade
Vogal: Doutora Diana I.S.P Resende

10. Form of Advertising/notification of results: The final results of the evaluation will be published through a list sorting the candidates according to their attributed marks, on the CIIMAR website and by e-mail;
After the announcement of the results, candidates are considered automatically notified to, if they wish to do so, comment on the results on a preliminary hearing period within 10 working days after that date, as provided for in the Código do Procedimento Administrativo.
The jury reserves the right to not assign the grant depending on the quality of the applications.
In case of resignation or withdrawal of the selected candidate, the next candidate with the highest evaluation score will be notified immediately.
Based on the final sorted list of the candidates it will be made a reserve list that will be used for the future recruitment of grantees for this project.

11. Deadline for application and presentation of applications: The competition is open from 8/07/22 until 21/07/22. The applications must be formalized, compulsorily, by sending the following documents:
- detailed Curriculum vitae with clear specifications of i) contact e-mail address and phone number; ii) list of peer-reviewed publications, books and/or reports that prove the experience in the above-mentioned fields; iii) list of the computer skills (software and/or programming languages for simulation and data analysis; newly developed software); - certificates (copy) of the previous academic degrees, specifying mandatorily the final classification; - for degrees obtained abroad, proof of recognition of academic degrees assigned by foreign higher education institutions and registration of the conversion of the final classification (GPA) to the Portuguese classification scale; - Portuguese language proficiency certificate (not applicable for candidates from Portugal and those from the Portuguese-speaking countries); - motivation letter with the indication of the reference of the competition (as indicated in this announcement);
-any other documents that the candidates may recognize as relevant to demonstrate the adequacy to the function.

The applications should be sent by e-mail to: rh@ciimar.up.pt with the reference indicated in this announcement in the subject line. The applications that do not include all the elements previously indicated will not be considered.

12. Non-discrimination and equal access policy: CIIMAR actively promotes a non-discrimination and equal access policy, wherefore no candidate can be privileged, benefited, impaired or deprived of any rights whatsoever, or be exempt of any duties based on their ancestry, age, sex, sexual preference, marital status, family and economic conditions, instruction, origin or social conditions, genetic heritage, reduced work capacity, disability, chronic illness, nationality, ethnic origin or race, origin territory, language, religion, political or ideological convictions and union membership.

Pursuant to Decree-Law no. 29/2001 of 3 February, disabled candidates shall be preferred in a situation of equal classification, and said preference supersedes any legal preferences. Candidates must declare, on their honor, their respective disability degree, type of disability and communication/expression means to be used during selection period on their application form, under the regulations above.