

Public notice 365/2025 - Public notice CI-CTTI-06-SGRH/2025 — Doctor Paulo Jorge dos Santos Gonçalves Ferreira, Full Professor and Rector at the University of Aveiro, hereby announces that for a period of thirty business days starting on the first business day following after which this notice is published in the *Diário da República*, an international public competition is opened, for the recruitment of 1 (one) position as Assistant Researcher in the scientific area of Environmental Sciences and Engineering, subarea Environmental Quality and Management, under an indefinite employment contract, entered into under the Labour Code, with the monthly remuneration corresponding to that of the first remuneration position of the respective category, on an exclusive dedication basis (€3501,28), to exercise functions at the University of Aveiro.

Characterization of the competition: The Mediterranean region is facing increasing pressures on agroecosystems due to unsustainable soil management practices and climate change, leading to soil quality deterioration. The researcher will conduct interdisciplinary research on soil-biochar-biota-climate interactions to enhance soil functions; assess the short- and long-term benefits of biochar use in climate change adaptation and mitigation; study soil-biochar-biota-climate interactions at both laboratory and field scales; develop ecosystem management approaches to improve soil health, agricultural ecosystem functions, and crop yields; identify suitable soil health indicators and optimise monitoring tools for climate change adaptation and mitigation capacity; and evaluate the sustainability of biochar application in terms of benefits and potential environmental and socio-economic trade-offs in agricultural and agroforestry ecosystems.

The opening of this competition was authorized by order of 30<sup>th</sup> November 2024, of the Rector of the University of Aveiro, issued on the proposal of the Scientific Council.

This competition is open under the FCT-Tenure Funding Programme/instrument – 1st Edition (2023) (Reference 2023.15265.TENURE.006) and is governed by the provisions contained in the Regulation on the Private Researcher Career Personnel Regime in Private Rule of Law at the University of Aveiro and respective contract (Regulation no. 609/2015, published in the Official Gazette no. 174, 2nd series, of 7 September), Statute of the Scientific Research Career and by other applicable legislation and regulatory standards.

As it is subordinated to the FCT-Tenure Program/funding instrument, and is dependent on obtaining it, this call complies with the conditions established therein and in particular the following:

i) The call is especially aimed at candidates with a PhD degree and with high potential and research capacity in the scientific area of Environmental Sciences or a related area, within the scope of the strategic objectives of the University of Aveiro/CESAM Research Unit, with the following function profile: specialist in sustainable soil management based on biochar, contributing to the strategic objectives of CESAM and the mitigation of critical

environmental challenges related to soil health and climate change, promoting a sustainable and resilient future aligned with EU priorities.; and, while the FCT support identified above is in force, with the provision of a maximum limit of 4 hours per week of time dedicated to teaching activity (average value per three-year period);

- ii) Only PhD candidates who have usufruct a fixed-term contract or scholarship, such as a doctorate, in an Institution of the National System of Science and Technology (Institutions as described in Decree-Law No. 63/2019, of 16 May) can be opponents of this competition;
- iii) Doctorates who hold legal employment relationships for an indefinite period in the careers of Scientific Research, University Lecturer and Polytechnic Higher Education Lecturer, and indefinite in national institutions not covered by the Career Statutes, cannot be opponents to the competition.
- 1. Scientific area:
- 1.1. The scientific area of this contest is Environmental Sciences and Engineering.
- 1.2. The Scientific Council has not identified any related scientific areas.
- 2. Admission requirements:
- 2.1. It is a requirement for admission to the competition: to hold a doctoral degree in the scientific area of the competition or in a scientific area considered by the Scientific Council as related to the one for which the competition is open or, also, those who, although with a doctorate in a different area, have a relevant scientific curriculum in these areas, in accordance with the provisions of the characterization of the competition, in particular in paragraphs i) to iii).
- 2.2. Applicants with qualifications obtained abroad must provide proof of recognition, equivalence or registration of the doctoral degree in the scientific area for which the competition is open, or in one of the sub-areas mentioned above, in accordance with the applicable legislation. This formality must be fulfilled up to the date of signing the contract.
- 3 Application requirements:
- 3.1. The Applications must be accompanied by the following documents:
- a) Application minute for the competition addressed to the Rector of the University of Aveiro;
- b) Detailed *curriculum vitae* containing all of the pertinent information for the assessment of the applicant considering the items of evaluation of point 5.3.2 of the present notice, and it must be organized according to the evaluation criteria and sub-factors detailed in point 6;
- c) Copies of papers selected by the applicant as being most representative of their curriculum vitae, no more than five;
- d) Presentation of a single document containing the justification of the papers selected in the previous paragraph;

- e) Report on scientific, pedagogical and other activities considered relevant to the University's mission (the candidate must include the contributions he/she has made and that he/she considers relevant, in particular in the scope of the works he/she has selected as being more representative);
- f) Scientific project: Document with a maximum of 10 pages that allows the support of a future mission letter and that must include a proposal of the activities that the candidate intends to develop during the first five years of the activity as an Assistant Researcher, explaining how it may contribute to the progress and development of the disciplinary area for which the competition is opened, in accordance with the provisions of paragraph i) of the "Characterization of the Competition", in the scientific and cooperation with society aspects;
- g) Document that objectively highlights the number of citations (if applicable) to the publications listed in the curriculum vitae and explanation of the method used to count the citations with enough detail so that the jury is able to reproduce the procedure in accordance with section 6. The candidate must provide the identification method of the name to search;
- h) Any other elements that the applicant deems relevant or the assessment of his or her merits.
- 3.2. The application minute must be fully completed, dated and signed, of mandatory use, available at https://www.ua.pt/file/75846.
- 3.3. The *curriculum vitae* should contain:
- a) Full name of the candidate;
- b) Document proving that you have usufruct a fixed-term contract or scholarship, as a doctorate, in an Institution of the National Science and Technology System (Institutions as described in Decree-Law No. 63/2019, of 16 May);
- c) Specialization pertaining to the scientific area in which the Competition was opened;
- d) Copy of the certificate with the respective classification or other document that is legally recognized for the same effect. Applicants who hold a doctor's degree obtained abroad, must provide proof of recognition, equivalence or registration of a PhD degree, by a Portuguese higher education institution, in accordance with the applicable legislation;
- e) All relevant information for the evaluation of the application, taking into account the evaluation strands set out in section 5.3.2. of this notice, and it must be organized according to the evaluation criteria and subfactors detailed in point 6;
- f) Documents proving all of the elements mentioned in subsections b), c), d) and e) of point 3.3.
- 3.4. The applicants belonging to the University of Aveiro are exempt from the presentation of the documents referred to in point d) of point 3.3, which appear in their individual file.
- 3.5. How to present the application:
- 3.5.1. The application may be presented in Portuguese or in English and handed in via email to the Human Resource Department of the University of Aveiro (<a href="mailto:sgrh-avct-recrutamento@ua.pt">sgrh-avct-recrutamento@ua.pt</a>), by the deadline stipulated in this Notice. The Services will issue a message proving the electronic validation of the same.

- 3.5.2. Instructions for the submission of applications, in digital format, are available in the area of Recruitment and Job area Human Resources at Researcher staff new applications and offers sgrh Universidade de Aveiro.
- 3.5.3. When formalizing the application, if a classified document is submitted that reveals a commercial or industrial secret; a secret relative to the literary, artistic, or scientific property; or that requires confidentiality, the candidate must identify the document with this information, under penalty of the work in question being unrestrictedly accessed by any of the other candidates, when consulting the file.
- 3.6. Non-compliance with the deadline for submission of the application, as well as failure to submit or late submission of the documents, referred in points 3.1, a) to h), will lead to the disqualification of the application. Candidates will be notified of the exclusion decision by e-mail, for the purposes of the hearing of interested parties, in accordance with Articles 121 et seq. of the Administrative Procedure Code.

## 4. — Competition Jury:

4.1. — The jury of the competition is composed as follows:

President: Doctor Paulo Jorge dos Santos Gonçalves Ferreira, Rector of the University of Aveiro. Jury members:

- Professor Doctor Cláudia Pascoal, Associate Professor with habilitation, Universidade do Minho;
- Professor Doctor Tiago Morais Delgado Domingos, Associate Professor, Instituto Superior Técnico of the Universidade de Lisboa;
- Professor Doctor António José Dinis Ferreira, Coordinator Professor ofEscola Superior Agrária de Coimbra, Instituto Politécnico de Coimbra;
- Professor Doctor Amadeu Mortágua Velho da Maia Soares, Full Professor, Universidade de Aveiro;
- Professor Doctor Maria de Fátima Lopes Alves, Associate Professor with habilitation, Universidade de Aveiro.
- 4.2. The deliberations are held by roll-call vote requiring the absolute majority of the votes of the members of the jury present at the meeting, abstentions are not allowed.
- 5. Admission and exclusion of applications:
- 5.1. Approval on absolute merit:

The admission of candidates is conditional on their approval on absolute merit, based on the merit of the candidates' overall *curriculum* in the scientific area of the competition, also taking into account, cumulatively, the fulfillment of at least one of the following requirements:

5.1.1. — The applicant is the author or co-author of at least 30 articles in the scientific area that the Competition is open, indexed in the Science Citation Index Expanded of the Web of Science from Clarivate Analytics where document type = article or document type = review or in the SCI Verse Scopus with the same characteristics;



or

5.1.2. — Have obtained a total of at least 2500 citations (excluding self citations) for scientific works produced in the disciplinary area for which the competition is open;

or

- 5.1.3. Have an h index, according to SCOPUS or Clarivate Analytics' Web of Science, of at least 15 regarding the scientific works produced in the disciplinary area for which the competition is open.
- 5.2. Applicants must provide proof of the fulfilment of the above(s) requirements (5.1.1 to 5.1.3 indicating the key to be used in the search for Web of Science from Clarivate Analytics or SCI Verse of Scopus that proves it, or including in their CV listing of the same database that confirms it.
- 5.3. Selection and interview method:
- 5.3.1. The method of selection is the assessment of the curriculum which aims to assess the applicant's scientific performance and performance in other activities relevant to the mission of higher education institutions.
- 5.3.2. In the assessment of the curriculum the following items are mandatorily considered and pondered in accordance with the requirements of the functions corresponding to the position to be filled with the present Competition:
- a) The scientific performance of the applicant in the subject area of the call;
- b) Knowledge transfer;
- c) Participation in management entities;
- d) Scientific project.
- 5.3.3. In the evaluation of the aspects referred to in points a), b) and c) of the previous point, the extent of the curriculum of the candidates should be taken into account and the activity developed in the last five 5 (five) years and will represent 80% of the assessment in each of these areas.
- 5.3.4. The jury will deliberate at the first meeting on the need to interview the approved candidates, which does not constitute a selection method and is not classified, but aims to obtain clarifications or the explanation of elements contained in the application.
- 5.3.5. If there is a need to carry out interviews, they will take place before the second meeting of the jury, and the candidates will be called, at least five days in advance, of the date and place where these interviews will take place.
- 5.3.6. The interviews referred to in the previous point may be held by teleconference.
- 5.3.7. In the event that the jury decides on the holding of interviews, as enshrined in point 5.3.4., candidates who unjustifiably do not attend the interviews are not subject to evaluation and are excluded.

## 6. — Assessment criteria:

In applying the criteria mentioned in the point 5.3.2 the following parameters are evaluated and assigned the weighting factors indicated:

- 6.1. Criteria for assessing Scientific Performance:
- 6.1.1. Scientific production. Quality and quantity of scientific production in the area that the Competition is open (books, articles in scientific journals, papers presented at conferences) expressed by the number and type of publications, and the recognition given by the scientific community (the quality of the location where it has been published and the references made by other authors).
- 6.1.2. Participation in scientific projects. The quality and quantity of scientific projects in which the applicant participated within the subject area of the competition; whether financed through public funds of national or international agencies or by companies. The assessment of the quality will take into account the level of funding obtained, the role played in the project (ex: principal investigator, guest consultant, participant), the degree of difficulty of the funding programme, the expert evaluation of the completed projects, particularly if they led to the development of products or services.
- 6.1.3. Intervention in scientific community. Assessing the capacity to intervene in scientific community, particularly by organising events, being (co-)editor of magazines, participation in the assessment of projects and articles, being invited to give speeches, being a member of academic juris, as well as being recognized through awards or other distinctions and respective impact.
- 6.1.4. Constitution of research teams and supervision of academic work of post-doctoral, doctoral and master students in the area and domain of the competition.
- 6.2. Criteria for the assessment of Knowledge Transfer:
- 6.2.1. Patents, registration and ownership of rights, elaboration of technical regulation and legislation. Patent authorship and co-authorship, records of ownership of intellectual property rights regarding software, mathematical methods and rules of mental activity. Participation in standardization committees and in the drafting of legislative projects and technical regulation. The evaluation of this criterion should also take into account the resulting economic valuation of patents and intellectual property rights.
- 6.2.2. Consulting services, tests and measurements. Participation in consulting activities, tests and measurements involving private and/or public sector. Teaching vocational training courses or technological expertise directed at companies or the public sector. Participation as a former in vocational training or technological specialization courses aimed at companies or the public sector. The evaluation of this criterion will also take into account the economic valorization of research results achieved, measured by the contracts of technology transfer and development that have resulted and contribution to the creation of spin-off companies.
- 6.2.3. Dissemination of science and technology. Participation in initiatives to disseminate scientific and technological knowledge under the auspices of the the scientific community (for example organisation of congresses and conferences) and addressed to varied audiences. Publications to disseminate science and technology. Presentation of lectures and seminars for the general public. Impact that the work developed by

the candidate in the area and subarea for which the competition is opened, has on the broader scientific community (e.g., references in scientific dissemination forums).

- 6.3. Criteria for evaluation of Institutional management:
- 6.3.1. The candidate's participation in scientific, pedagogical or institutional management activities and participation in academic juries outside his own institution.
- 6.4. Criteria for evaluation of the Scientific project:
- 6.4.1. The clarity of its structure and the quality of exposure. The scientific relevance of the content and the adequacy of the proposed program, considering the frontier of knowledge in the area and domain of the competition. The degree of innovation introduced.
- 6.5. The weighing for the above-mentioned criteria are presented in the following table:

Items	Weights	Criteria	Weights
Scientific Performance	P1=0,65	Scientific production (C11)	P11=0,50
		Participation in scientific projects (C12)	P12=0.25
		Intervention in scientific community (C13)	P13=0.10
		Constitution of research teams (C14)	P14=0.15
Knowledge Transfer	P2=0,15	Knowledge transfer or industrial activities, consultancy services, testing and measurements, and science dissemination or management activities (C21)	P21=1,00
Institutional Management	P3=0,05	Activities of Institutional Management (C31)	P31=1,00
Scientific Project	P4=0,15	Scientific Project (C41)	P41=1,00

Table - Weights for the assessment criteria

## 7. — Assessment and selection:

- 7.1. After the admission of the application to the Competition, the jury will begin the processes of analysis of the applications, taking into account the items and criteria set out in this notice.
- 7.2. In the first meeting, which may take place by teleconference as decided by the jury president and after examination and admission of applications, the jury begins to decide which applicants pass to the next phase on absolute merit. To this purpose, each member of the jury proposes, which applications do not meet the requirements at both a scientific and pedagogic level as established by the Notice for the present Competition. After all jury members have submitted their proposals to the President of the jury, the jury votes on each application, for which rejection is proposed, and no abstentions are allowed; an application is rejected on absolute merit if obtains a majority of votes favourable to the rejection among the members of the jury present at the meeting. Each application will be voted only once. Other proposals, which eliminate the same application will not be voted on. The final decision on each proposal, as well as the number of votes collected by each of them, and their bases, are an integral part of the minutes.

- 7.3. In the case of an application not receiving absolute merit approval, the jury proceeds to holding a hearing the excluded applicants, who may contest within 10 days.
- 7.4. The jury then assesses those candidates approved according to absolute merit, considering the criteria and parameters of assessment as well as the ranking factors in this notice.
- 7.4.1. Each member of the jury evaluates, on a scale of 0 to 100, each criterion or aspect, for each candidate.
- 7.4.2. The final score is expressed on a numerical scale from 0 to 100 and is calculated by weighting each criterion with the corresponding weight, leading to the strand score, which in turn will be used with the corresponding weight for the final score calculation. Expressed as a formula, the final score (FR) is calculated as follows:

## FR = P1\*(C11\*P11+C12\*P12+C13\*P13+C14\*P14) +P2\*(C21\*P21) + P3\*(C31\*P31) +P4\*(C41\*P41)

- 8. Voting methodology and ordering:
- 8.1. The ordering of candidates should be founded on the assessment made based on strands and criteria of assessment and corresponding weighing factors listed in this notice.
- 8.2. Before voting, each member of the jury presents a written document, that will be attached to the minutes of the meeting, with the order of the applicants, duly founded, taking into consideration the previous paragraph.
- 8.3. On the various votes, each jury member should respect the order presented, no abstentions allowed.
- 8.4. The jury will use the following voting method in order to obtain an absolute majority in the final ranking of candidates:

The first vote is intended to determine the applicant to be put in first place. If an applicant receives more than half the votes of the members of the jury present at the meeting, he will be placed in first place. If the applicant in first place is not determined, the voting will be repeated, but only among the candidates who received votes to be considered for first place after removal of the applicant least voted in the first round. If there is more than one applicant in the position of least voted there will be another vote with only these applicants in order to determine who is to be eliminated. For this vote, the jury members vote for the applicant who has the lowest ranking, the applicant with the most votes are eliminated. If at this point there continues to be a tie among two or more applicants, the president of the jury will decide which of them is to be eliminated. Once this elimination is made, the jury returns to the first vote, but only with the remaining candidates. The process is repeated until one applicant receives more than half the votes for first place. The process is repeated for second place and so on until an ordered list of all candidates is complete.

- 9. Participation of interested parties and the decision:
- 9.1. The final draft ranking is notified to the candidates, for the purpose of holding a hearing of the interested parties, in accordance with Articles 121 et seq. of the Administrative Procedure Code.

- 9.2. Once the interested parties have had their hearings, the jury assesses their allegations and approves the final ranking of the applicants.
- 10. Deadline for final decision:
- 10.1. Notwithstanding the following paragraph, the deadline for delivering the jury's final decision cannot surpass ninety consecutive days, starting from the deadline for submission of applications.
- 10.2. The deadline mentioned in the previous subsection may be extended when there is a high number of applicants and or when the particular complexity of the Competition justifies it.
- 11. The Researcher will be hired for an indefinite period with an experimental period of three years to carry out the functions described in the letter of mission and inherent in the category of Assistant Reasearcher.
- 12. Publication of Competition notice:

In addition to being published in Series 2 of the Diário da República the present notice is also published in:

- a) The public employment pool;
- b) The website of the Foundation for Science and Technology, I.P., in Portuguese and English;
- c) The website of the University of Aveiro, in Portuguese and English;
- d) In two national newspapers.
- 13. In compliance with paragraph h) of Article 9 of the Constitution of the Portuguese Republic, the Government, as the employing entity, actively promotes a policy of equal opportunities between men and women in access to employment and professional advancement, scrupulously taking measures to avoid any form of discrimination.

30 November 2024 — The Rector, Professor Doutor Paulo Jorge dos Santos Gonçalves Ferreira.