

OPEN CALL

COST Action **CA18202 NECTAR** – Network for Equilibria and Chemical
Thermodynamics Advanced Research

and

Working group 1 – NECTAR for highly hydrolysable and/or low-valence state cations
will organize the

1st NECTAR

**Advanced school on aqua ions and hydrolysis-
related equilibria
(NECTAR-EquiAqua)**

September 29th, 2023

Ruđer Bošković Institute, Zagreb, Croatia



Funded by
the European Union

Open Call

This is an open call aimed at recruiting 20 (twenty) participants for the **1st NECTAR Advanced school on aqua ions and hydrolysis-related equilibria**, called **NECTAR-EquiAqua**.

NECTAR-EquiAqua will be held in the Ruđer Bošković Institute, **Zagreb, Croatia**, the September 29th, 2023.

Deadline for application to the training school is **July 17th, 2023**. Notification of acceptance will be sent not later than **July 24th, 2023**.

All the 20 (twenty) participants will be recruited and financed by NECTAR COST Action CA18202 (www.cost-nectar.eu, <https://www.cost.eu/actions/CA18202/>), in the terms described in this document.

The main procedures regulations concerning TS for COST Actions are governed by the [COST Annotated Rules](#)

Scopes of NECTAR-EquiAqua

Metal ions are crucial players in many phenomena occurring in biological, environmental, and technological systems. Some of these chemical elements, i.e., metal ions with a strong hydrolytic character and those with several redox states, have characteristics that make the study and understanding of their chemical equilibria particularly difficult. Moreover, since these elements continuously interact with other substances present in any aqueous media, understanding their behaviour also requires knowing the result of such interactions. In this context, the equilibrium modelling of these systems is particularly challenging.

The goal of this advanced school is, on the one hand, to give participants a broad view of key issues encountered when working in aqueous media with highly hydrolysable or low-valence cations. On the other hand, we aim to equip participants with tools and strategies to work and modelling these challenging systems.

NECTAR-EquiAqua is a 1 day training school that will take place in the Ruđer Bošković Institute, in Zagreb, Croatia. During the advanced school, plenary lectures will be given by experts in the field followed by dynamic discussions with the participants.

Scopes of NECTAR COST Action

The thermodynamic study of chemical equilibria represents the core of many important branches of chemistry, from coordination and supramolecular chemistry, to chemical speciation, to molecular modelling and drug design. The importance of chemical equilibria, and chemical thermodynamics in general, results from the simple assertion that many properties of elements and compounds depend mainly on their interactions in a given system: the biological activity of an element or molecule, or their environmental impact can be explained by a detailed study of these interactions, whose nature and strength can be evaluated by chemical equilibrium and other thermodynamic studies.

NECTAR combines the expertise of the large community of specialists working in the field of thermodynamic studies of chemical equilibria. The scopes of this Action are to create a network based on the stimulating collaboration between them, to promote knowledge exchange, and to achieve high technological progress. All this will be accomplished through a fruitful collaboration between young

researchers and experienced scientists, taking into consideration gender balance and maximal geographical distribution. Innovative and integrated theoretical and experimental approaches will be established and optimized. Overall, the outstanding quality of obtained results will serve as benchmark for next decades, allowing their application in the above-mentioned fields and substantially impacting on life quality of next generations.

For further details and specific objectives, please read the Memorandum of Understanding (MoU) of NECTAR COST Action: <https://www.cost.eu/actions/CA18202/>.

Purpose of COST TSs

Training Schools aim to facilitate capacity building on a topic relevant to the theme of the respective COST Action through the delivery of intensive training on a new or emerging subject. They can also offer familiarisation with unique equipment or expertise and are typically, although not exclusively, considered to be for the benefit of ECI and PhD students. They are not intended to provide general training.

Application Procedure

All applicants must fill, scan and sign the application form (available at: www.cost-nectar.eu) and send it by email to wg1@cost-nectar.eu together with a signed copy of their CV and a motivation letter, indicating their interest in the training school, not later than **July 17th, 2023**.

Application email must have subject: "NECTAR-EquiAqua Application Form, SURNAME NAME" and contain the following documents:

1. A "Motivation Letter" (max 1500 words) explaining the scientific motivation for the participation to the TS and what scientific and/or other outcomes you aim to accomplish with the TS.
2. A CV, drafted preferably in Europass format (max. 3 pages). A list of academic publications can be added in separate pages.

General eligibility and evaluation criteria

NECTAR-EquiAqua is open to any participant including stakeholder interested in studying and understanding the chemical equilibria in aqueous media of metal ions with a strong hydrolytic character and those with several redox states. The grant applicant must be Action participants with a primary affiliation to a legal entity located in a COST Full or Cooperating Member country, a COST Near Neighbour Country or a European RTD Organisation. See [Annotated Rules for COST Actions](#) for more information.

Eligibility criteria:

Participants shall be employed by, or affiliated to, an institution, organisation or legal entity which has within its remit a clear association with performing research, and belongs to a NECTAR COST Action Member Country, or is an approved NECTAR Near Neighbour Country (NNC) Institution or an approved European RTD Organization.

General criteria for evaluation:

- Priority to active members in the NECTAR COST Action (CA18202);
- Geographical/Institutions distribution;
- Priority to applicants from ITCs;
- Gender balance;
- Motivation letter;
- Curriculum Vitae.

The selection of applicants will be performed by the Scientific Committee composed by Prof. Demetrio Milea (Action Chair), Prof. Sofia Gama (Action vice-Chair), Prof. Enrique García-España (NECTAR Training Schools Coordinator), Dr. Olga Iranzo (leader WG1) and Prof. Montserrat Filella (co-leader WG1).

Trainee/Students reimbursement

After the notification of the acceptance, NECTAR trainees will need to formalize their trainee status online on their e-COST account.

Reimbursement will be given according to the [Annotated Rules for COST Actions](#), with a daily allowance fixed by the NECTAR Action Management Committee at a maximum of 140 €/day.

TS Reporting

Within 30 days from the end date of the TS, all the trainees must submit the dissemination material elaborated during the training school, directly to wg5@cost-nectar.eu and to the WG5 leader Dr. Álvaro Martínez Camarena (alvaro.martinez@uv.es). **Failure to submit the dissemination materials within 30 days from the end date of the TS will effectively cancel the Grant.**

Deadlines

Relevant dates are as follows:

- **July 17th, 2023:** deadline for submission of TS applications
- **July 24th, 2023:** notification of selected participants

Committees

Scientific Committee

Prof. Demetrio Milea (Action Chair)
Prof. Sofia Gama (Action vice-Chair)
Prof. Enrique García-España (TSM)
Dr. Olga Iranzo (leader WG1)
Prof. Montserrat Filella (co-leader WG1)

Organisation Committee

Prof. Elvira Bura Nakić
Dr. Dario Omanović
Dr. Saša Marcinek
Dr. Lucija Knežević
Dr. Olga Iranzo (leader WG1)
Prof. Montserrat Filella (co-leader WG1)



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Contacts

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