Assistant Professor in Environmental Chemistry of Organic Contaminants with emphasis on Data Science Tools

Stockholm University is one of Europe's leading higher education institutions. Located in the cultural hub and economic center of Sweden, Stockholm University provides attractive studying and working conditions for more than 34,000 students and 5,000 employees (within the natural sciences, humanities and social sciences).

Open position in the Department of Environmental Science

The Department of Environmental Science is one of the largest departments in the Faculty of Science. The department is divided into four units with more than 190 researchers, teachers, doctoral students and technical/administrative staff from over 30 countries. Research and teaching focuses on chemical contaminants, atmospheric science, biogeochemistry and (eco)toxicology. As an employee at the Department of Environmental Science you will be part of a dynamic environment with a strong international profile.

Research in the Contaminant Chemistry Unit focuses on the occurrence and behavior of pollutants in the environment and in the technosphere. Areas of particular focus include the discovery of new contaminants, understanding the physical, chemical, and biological pathways that contaminants follow, and the development of novel tools and techniques for sampling and analysis. We strive to synthesize our scientific understanding about the sources, transport, transformation, bioaccumulation and pharmacokinetics of environmental contaminants into mathematical models that inspire new scientific hypotheses, and support environmental decision-making.

The 21st century has seen exponential growth in both the volume and diversity of organic chemicals and plastic produced globally. As emissions increase, our ability to identify and monitor these so-called "novel entities" in the environment using conventional tools becomes increasingly difficult. To address this problem, next-generation analytical and data science tools are urgently needed. For example, state-of-the-art mass spectrometers can now measure thousands of known and unknown chemicals simultaneously, providing unprecedented insight into the extent of chemical contamination of the global environment. At the same time, data science tools such as machine learning (and more generally, artificial intelligence) have opened up new possibilities for predicting, identifying, and quantifying problematic chemicals, and for improving our understanding of their environmental fate, behavior and effects. These emerging data science tools are increasingly in demand in a range of jobs in private industry and government, highlighting the need for their inclusion in our Department's Educational programme.

Considering the rapid growth within environmental chemistry and data science, we believe it is strategically important to recruit an early career Environmental Chemist with expertise in emerging Data Science tools to support our core missions in research, teaching and outreach. The successful applicant will be encouraged to exploit our state-of-the-art interdepartmental Mass Spectrometry lab (MassSLab), as well as existing networks such as the Centre for Circular and Sustainable Systems (SUCCeSS), and Science for Life Laboratory (SciLifeLab), while building new connections which contribute to enhancing the Department's reputation as a global leader in Environmental Science research and education.

Qualification requirements

The applicant must have completed a doctoral degree in Sweden or an equivalent degree from another country. In the first instance, an applicant should be considered who has received such a degree no more than five years before the deadline for applications (certain exceptions apply).

Assessment criteria

In the appointment process, special attention will be given to research skills. Teaching skills will also be considered. The assessment of research skills will focus primarily on merits within the subject area of the position.

Application

In order to apply for this position please use the Stockholm University web-based application form. You will find the application form in the appropriate announcement (Ref. No. SU FV-0022-24) at https://www.su.se/english/about-the-university/work-at-su/available-jobs.

Deadline for applications: 2024-06-03

Photo: Jan Löf

More information

Visit our website at: www.aces.su.se. Further information about the position can be obtained from:

Professor Anna Sobek, Head of Department
Tel: +46 8 674 7230, anna.sobek@aces.su.se

Professor Jonathan Benskin, Unit Head-Contaminant Chemistry
Tel: +46 76 426 5490, jon.benskin@aces.su.se

Department of Environmental Science
www.aces.su.se