

Diversity and Function of Microorganisms in Nature (Uppsala 25-29 February 2008, 3 hp)

This course will introduce students to the complexity of microbial life in the biosphere and highlight the molecular and ecological processes that control microbial diversity and function in different ecosystems. Examples will be from all three domains of life (Bacteria, Archaea, Eukarya). We will present and discuss both established and emergent tools for microbial community analysis and downstream analyses of the data. The course will be accessible to a broad group of graduate students with backgrounds in biology and related disciplines.

The course is based on a series of lectures by a group of invited specialists. The central theme of the talks will be microbial diversity in natural ecosystem as well as the processes and mechanisms controlling populations and communities. There will also be more technical topics ranging from single-cell techniques to environmental genomics. This is a full-time course with lectures running from 9.00-18.00 Monday 25/2 through Friday 29/2 with additional practical and theoretical exercises. In the beginning of the course, all students will give a 10 min presentations of their own research and their perspective on the course topic. There will also be a Journal Club where we discuss recent key papers related to microbial community ecology and diversity. Examination will be by participation in practical exercises and hand-in assignments related to the content of lectures.

Teachers involved (tentative): Stefan Bertilsson (UU); Ramunas Stepanauskas (Bigelow Laboratory for Ocean Sciences); Lasse Riemann (Kalmar University); Thomas Sicheritz-Ponten (Technical Univ-Denmark); Dan Andersson (UU); Sandra Baldauf (UU); Roger Finlay (SLU); Stina Drakare (UU); Laura Alonso (UU); Rolf Bernander (UU) and others.

Further information and registration:

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Application deadline: **31 January 2008**

(First come first serve; limited to 26 participants)

Schedule will be available shortly

