Workshop on Limits to Diversity Assembly

19 - 21 January 2021
An ICTP Virtual Meeting
Trieste, Italy

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The stunning diversity of many ecological communities is often the result of a long process in which the community is assembled. No community is a closed system, and the observed taxonomic and functional diversity is the result of successful invasions and local extinctions. Some aspects of this process are reproducible and general, depending on fundamental ecological and functional constraints and determining a directionality in the assembly process. These constraints depend on fundamental limits to diversity, such as competitive exclusion, but also on the trajectory of the assembly itself, for instance through niche construction. Other factors are intrinsically random, as they depend on the limitedness of the available pool of diversity and on historical contingency. The interplay of universal features and contingent ones — together with the combinatorial character of possible assembly histories — makes the process of assembly non-trivial to study quantitatively.

This workshop aims at exploring ecological assembly at the interface between theory, experimental results, and field data.

Topics:

• community assembly
• competitive exclusion
• bottom-up vs top-down assembly
• biodiversity

Directors:

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Local Organizer:

J. GRILLI, ICTP, Italy

Confirmed Speakers:

L. BITTLESTON, Boise State University, USA
G. BUNIN, Technion, Israel
J.A. CAPITAN, Technical University of Madrid, Spain
C.-Y. CHANG, Yale, USA
M. DAL BELLO, MIT, USA
Q. HE, University of Chicago, USA
D. MAYNARD, ETH, Switzerland
V. MARQUIONI MONTEIRO, UNICAMP, Brazil
M. TIKHONOV, Washington University in St.Louis, USA

How to apply:

Online application:
http://indico.ictp.it/event/9511/

Female scientists are encouraged to apply.

Registration:

There is no registration fee.

Deadline:

14 January 2021

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