

UKRAINIAN SCHOOL IN EVOLUTIONARY BIOLOGY

JANUARY 27-31, 2025

Sponsors:

Organizers:













| JST | EST | GMT | CET | EET | Monday (27.01.2025) | | |
|---------------------------------------|---------------|-----------------|-----------------|-----------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--|
| 16:00 | 02:00 | 07:00 | 08:00 | 09:00 | Welcome coffee | | |
| 17:00- 18:30 | 3:00- 4:30 | 8:00- 9:30 | 9:00- 10:30 | 10:00- 11:30 | Opening Location: Large conference hall,University President's Building, Narodna Square, 3, Uzhhorod. All lectures will be held in this room unless otherwise specified | | |
| Chair of the session: Natalia Volkova | | | | | | | |
| | | | | | Laurent Loison, CNRS, Paris, France | | |
| 18:30 | 04:30 | 09:30 | 10:30 | 11:30 | Plasticity-first evolution at the time of the rise of the Modern Synthesis. The Ukrainian contribution (1936-1948) | | |
| 19:30- 20:30 | 5:30- 6:30 | 10:30- 11:30 | 11:30- 12:30 | 12:30- 13:30 | Lunch | | |
| 20:30 | 06:30 | 11:30 | 12:30 | 13:30 | Oleksandr Maistrenko, Royal Netherlands Institute for Sea Research, Netherlands Introduction into mechanisms of evolution | | |
| 21:30 | 07:30 | 12:30 | 13:30 | 14:30 | Leonid Gorobets, National Science and Natural History Museum of the National Academy of Sciences of Ukraine How do you know this? Determining the species and age o bone remains (talk in Ukrainian, slides in English) | | |
| 22:30- 23:00 | 8:30- 9:00 | 13:30- 14:00 | 14:30- 15:00 | 15:30- 16:00 | Coffee break | | |
| 23:00 | 09:00 | 14:00 | 15:00 | 16:00 | Lujza Keresztes Ujvarosi, Babeş Bolyai University, Romania In pursuit of lost times: the evolutionary history of aquatic insects in the Carpathians related to the spatial and temporal patterns of Ice Age refugia from here | | |
| 00:00 | 10:00 | 15:00 | 16:00 | 17:00 | Andriy Marusyk, Moffitt Cancer Center, USA | | |
| | | | | | Evolutionary-informed approaches to forestall the development of resistance to targeted therapies in cancers | | |
| 01:00 | 11:00 | 16:00 | 17:00 | 18:00 | Fabia Ursula Battistuzzi, Oakland University, USA From so simple a beginning, endless forms are being evolved: how life originated on Earth | | |

| Day 2 | | | | | | |
|--------------------------------------------|---------------|-----------------|-----------------|-----------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
| JST | EST | GMT | CET | EET | Tuesday (28.01) | |
| Chair of the session: Oleksandr Maistrenko | | | | | | |
| 16:00 | 02:00 | 07:00 | 08:00 | 09:00 | Fyodor Kondrashov, OSINT, Japan Fitness landscapes as a concept and a practical tool: from evolutionary theory to protein design | |
| | | | | | Svitlana Serga, CBGP, INRAE, Montpellier, France | |
| 17:00 | 03:00 | 08:00 | 09:00 | 10:00 | The evolutionary dance: dynamics of host-symbiont interactions | |
| 18:00- 18:30 | 4:00- 4:30 | 9:00- 9:30 | 10:00- 10:30 | 11:00- 11:30 | Coffee break | |
| 18:30 | 04:30 | 09:30 | 10:30 | 11:30 | Robert Knell, University of Hull, United Kingdom Evolution of animal weaponry (Location for in-person participants: Department of Biology, Uzhhorod National University, Auditorium #137) | |
| 19:30- 20:30 | 5:30- 6:30 | 10:30- 11:30 | 11:30- 12:30 | 12:30- 13:30 | Lunch | |
| 20:30- 22:30 | 6:30- 8:30 | 11:30- 13:30 | 12:30- 14:30 | 13:30- 15:30 | Workshop Location: Department of Biology, Uzhhorod National University | |
| 22:30- 23:00 | 8:30- 9:00 | 13.30- 14:00 | 14:30- 15:00 | 15:30- 16:00 | Coffee break | |
| | 09:00 | 14:00 | 15:00 | 16:00 | Anna Karnkowska, Institute of Evolutionary Biology, University of Warsaw, Poland | |
| 23:00 | | | | | Exploring eukaryotic evolution: lessons from protist- bacteria symbiosis | |
| | | | | | Ophelie Ronce, ISEM, University of Montpellier, France | |
| 00:00 | 10:00 | 15:00 | 16:00 | 17:00 | Can assisted gene flow rescue threatened long-lived species from extinction in a changing climate? Insights from demo-genetic models | |
| | | | | | Ivan Parnikoza, National Antarctic Center of Ukraine; Institute of Molecular biology and Genetics NAS of Ukraine | |
| 01:00 | 11:00 | 16:00 | 17:00 | 18:00 | The history of Antarctic terrestrial biota: what organisms can tell us about it? (Pre-recorded lecture. For the discussion and questions Ivan will call from Antarctica if time and connection allows). | |













Dav 3

| Jay 3 | | | | | | | |
|-------------------------------------|---------------|-----------------|-----------------|-----------------|------------------------------------------------------------------------------------------|--|--|
| JST | EST | GMT | CET | EET | Wednesday (29.01) | | |
| Chair of the session: Dannie Durand | | | | | | | |
| 16:00 02 | 00.00 | 07:00 | 08:00 | 09:00 | Oleksandr Yuschuk, Ivan Franko National University of Lviv, Ukraine | | |
| | 02:00 | | | | Co-evolution of antibiotic production and antibiotic resistance in soil bacteria | | |
| | | | | | Nicolas Rode, CBGP, INRAE, Montpellier, France | | |
| 17:00 | 03:00 | 08:00 | 09:00 | 10:00 | How does phenotypic plasticity allow organisms to adapt to their changing environment? | | |
| 18:00- | 4:00- | 9:00- | 10:00- | 11:00- | Coffee break | | |
| 18:30 | 4:30 | 9:30 | 10:30 | 11:30 | Confee break | | |
| 18:30 (| 04:30 | 09:30 | 10:30 | 11:30 | Anja Spang, Royal Netherlands Institute for Sea Research, Netherlands | | |
| | | | | | Archaeal symbionts and the evolution of life | | |
| 19:30- 22:30 | 5:30- 8:30 | 10:30- 13:30 | 11:30- 14:30 | 12:30- 15:30 | Social event | | |
| 22:30- 23:30 | 8:30- 9:30 | 13:30- 14:30 | 14:30- 15:30 | 15:30- 16:30 | Lunch | | |
| | | 15:00 | 16:00 | 17:00 | Kateryna Makova, Eberly College of Science, Pennsylvania State University, USA | | |
| | 10:00 | | | | Complete sequencing and comparative analysis of ape sex chromosomes | | |
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Day 4

| Day 4 | | | | | | | |
|-----------------|--------------------------------------|-----------------|-----------------|-------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------|--|--|
| JST | EST | GMT | CET | EET | Thursday (30.01) | | |
| | Chair of the session: Svitlana Serga | | | | | | |
| 16:00 | 16:00 02:00 07:00 08:0 | 07:00 | 08:00 | 09:00 | Maria Ghazali & Igor Dzeverin, Schmalhausen Institute of Zoology of the National Academy of Sciences of Ukraine | | |
| 10.00 | | 00.00 | 7.00 00.00 | Integration and modularity: why and how to measure them for phenotypic traits in animals | | | |
| 17.00 | 00.00 | 00.00 | 10:00 | Lilia Popova, Schmalhausen Institute of Zoology of the National Academy of Sciences of Ukraine | | | |
| 17:00 | 03:00 | 08:00 | 09:00 | 10:00 | Destiny of Mammoth fauna and the Red Queen phenomenon (talk in Ukrainian, slides in English) | | |
| 18:00- 18:30 | 4:00- 4:30 | 9:00- 9:30 | 10:00- 10:30 | 11:00- 11:30 | Coffee break | | |
| 18:30 | 04:30 | 09:30 | 10:30 | 11:30 | Oleksandr Zinenko, Karazin Kharkiv National University, Ukraine | | |
| | | | | | Evolution of mitochondrial genomes in Vipera genus | | |
| 19:30- 20:30 | 5:30- 6:30 | 10:30- 11:30 | 11:30- 12:30 | 12:30- 13:30 | Lunch | | |
| 20:30- 22:30 | 6:30- 8:30 | 11:30- 13:30 | 12:30- 14:30 | 13:30- 15:30 | Workshop Location: Department of Biology, Uzhhorod National University | | |
| 22:30- 23:00 | 8:30- 9:00 | 13.30- 14:00 | 14:30- 15:00 | 15:30- 16:00 | Coffee break | | |
| 23:00 | 09:00 | 14:00 | 15:00 | 16:00 | Taras Oleksyk, Oakland University, USA Filling genome gaps in the forgotten parts of Europe | | |
| | | | | | Alan Bergland, University of Virginia, USA | | |
| 00:00 | 10:00 | 15:00 | 16:00 | 17:00 | Seasonally varying selection drives the evolution of a super-gene in Drosophila | | |
| 01:00 | 11:00 | 16:00 | 17:00 | 18:00 | Andrea Betancourt, University of Liverpool, United Kingdom Transposable element invasions in flies and butterflies | | |













Day 5

| JST | EST | GMT | CET | EET | Friday (31.01) | | |
|-----------------|-------------------------------------------|-----------------|-----------------|-----------------|---------------------------------------------------------------------------------------------------|--|--|
| | Chair of the session: Vladyslav Mirutenko | | | | | | |
| | | | | | Serge Utevsky, Karazin Kharkiv National University, Ukraine | | |
| 16:00 | 02:00 | 07:00 | 08:00 | 09:00 | Taxonomy as a gateway to understanding evolution: Challenges and insights from Hirudinea | | |
| 17:00 | 03:00 | 08:00 | 09:00 | 10:00 | Sebastian Schmidt, APC Microbiome and School of Medicine, University College Cork, Ireland | | |
| 17:00 | 03:00 | | | | Strain diversity in the global microbiome across habitats and phylogeny | | |
| 18:00- | 4:00- | 9:00- | 10:00- | 11:00- | Coffee break | | |
| 18:30 | 4:30 | 9:30 | 10:30 | 11:30 | Conee break | | |
| 10.20 | 04:30 | 09:30 | 10:30 | 11:30 | Dmytro Shabanov, Karazin Kharkiv National University, Ukraine | | |
| 18:30 | | | | | The evolutionary origin and maintenance of sexual | | |
| | | | | | reproduction and the problem of selection levels | | |
| 19:30- 20:30 | 5:30- 6:30 | 10:30- 11:30 | 11:30- 12:30 | 12:30- 13:30 | Lunch | | |
| | | | | | Dannie Durand, Carnegie Mellon University, USA | | |
| 20:30 | 06:30 | 11:30 | 12:30 | 13:30 | A horizontal transfer from Bacteria to Fungi enhances fungal pathogenicity | | |
| 21:30- 22:30 | 7:30- 8:30 | 12:30- 13:30 | 13:30- 14:30 | 14:30- 15:30 | Closing (summary by organisers) | | |

Workshops. Tuesday, 28 January, 13:30-15:30

- 1. Basic workshop in molecular biology methods (Svitlana Serga; in person; only for in person participants).
- 2. Introduction into bioinformatics (Walter Wolfsberger; online; for online and in person audience).
- 3. Phylogenomics and ancestral state reconstruction (Dannie Durand; in person; for online and in person audience).
- 4. LifeHucks of Grant Writing (Serge Utevsky online and Oleksandr Zinenko in person; for online and in person audience).
- 5. Writing and analysing an abstract (Andrea Betancourt online; for online and in person audience).

Workshops. Thursday, 30 January, 13:30-15:30

- 6. Basic workshop in molecular biology methods (Svitlana Serga; in person; only for in person participants).
- 7. Introduction into bioinformatics (Walter Wolfsberger, online; for online and in person audience)
- 8. Phylogenomics and ancestral state reconstruction (Dannie Durand; in person; for online and in person audience).
- 9. Career orientation (Andrea Betancourt online and Natalia Volkova in person; for online and in person audience).

Abstract writing. Writing a Motivation Letter (Fyodor Kondrashov online; for online and in person audience).











