



XIII INTERNATIONAL  
SYMPOSIUM ON LITTORINID  
BIOLOGY AND EVOLUTION

**XIII ISOLBE, 24-27th July 2023, Portugal**

# **Final Programme**

*Updated 21 July 2023*

## SUNDAY, 23<sup>rd</sup> July, 2023

18:00-20:00 Welcome reception

## MONDAY, 24<sup>th</sup> JULY, 2023

08:30 Registration  
 09:00 Opening Ceremony  
 09:30 Plenary talk  
 10:30 Coffee break  
 11:00 4 Regular talks  
 12:00 Extended talk  
 12:30 Lunch  
 14:00 5 Regular talks  
 15:15 Coffee break  
 15:30 4 Regular talks  
 16:30 Walking city tour

## TUESDAY, 25<sup>th</sup> JULY, 2023

09:00 Plenary talk  
 10:00 2 Regular talks  
 10:30 Coffee break  
 11:00 6 Regular talks  
 12:30 Lunch  
 14:00 Visit to "Galeria da Biodiversidade" – Porto

## WEDNESDAY, 26<sup>th</sup> JULY, 2023

09:00 5 Regular talks  
 10:15 Coffee break  
 10:15 Extended talk  
 11:45 4 Regular talks  
 12:15 Lunch  
 14:00 Extended talk  
 14:30 1 Regular Talk  
 14:45 General Discussion  
 15:15 Coffee Break  
 15:30 Discussion Groups  
 17:30 Conclusions

## THURSDAY, 27<sup>th</sup> JULY, 2023

09:00 Plenary talk  
 10:00 Regular talks  
 10:15 Coffee break  
 11:00 6 Regular talks  
 12:15 Lunch  
 13:45 Plenary talk  
 14:30 General Discussion  
 15:15 Coffee Break  
 15:30 Walking visit to the shore  
 20:00 Conference dinner

## MONDAY 24th

Chair | Rui Faria

09:30	Plenary talk	Kerstin Johannesson - <b>Marine snails at the intersection of ecology and genomics</b>
10:30	Coffee break	
11:00	Talk .1	Roger Butlin - Selection in <i>Littorina saxatilis</i> hybrid zones
11:15	Talk .2	James Reeve - Snail-scape genomics: assessing diversity and the role of inversions in Swedish <i>Littorina saxatilis</i>
11:30	Talk .3	Ana Peris - Genomic architecture of parallel phenotypic divergence in the marine snail <i>Littorina saxatilis</i> along shore levels and latitudinal locations
11:45	Talk .4	Marco Gerdol – First evidence of gene presence/absence variation in <i>Littorina</i>
12:00	Extended Talk .5(s)	Amin Ghane- Sex-linked genomic variation in various populations of <i>Littorina saxatilis</i>
12:30	Lunch	

Chair | Roger Butlin

- 14:00            Talk .6            Alan le Moan - **A strong barrier to gene flow between ecotypes focused on multiple chromosomal inversions**
- 14:15            Talk .7            Marina Rafajlović - **What generates bimodal hybrid zones?**
- 14:30            Talk .8            Aurélien De Jode - **Parallel divergence but different levels of reproductive isolation in a marine snail**
- 14:45            Talk .9            Alfonso Balmori - **What can SNPs tell us about Iberian populations of *L. saxatilis***
- 15:00            Talk .10            Juan Galindo - **Gene flow between Galician ecotypes: Ecology versus history**
- 15:15            Coffee Break

Chair | Juan Galindo

- 15:30            Talk .11            Emilio Rolán-Alvarez - **Negative assortative mating in *Littorina* (*Neritrema*) species: Field and laboratory insights into the evolutionary maintenance of a shell color polymorphism**
- 15:45            Talk .12(s)            Juan Gefaell - **A temporally stable and spatially recurrent color cline in *L. saxatilis* from four coastal inlets of NW Spain**

16:00	Talk .13(s)	Ramón Vigo - Unravelling the mechanisms responsible for a shell color cline in <i>Littorina saxatilis</i>
16:15	Talk .14	Rui Faria – The Stone Raft: using population genomics to understand the evolutionary processes shaping <i>Littorina</i> diversity in Iberian Peninsula

## TUESDAY 25th

Chair | Sean Stankowski

09:00	Plenary talk	Pierre-Alexandre Gagnaire - <b>Integrating recombination information into population genomics: why and how?</b>
10:00	Talk .15(s)	João Carvalho - <b>Differentiating scenarios of ecotype formation with pool-sequencing genomic data and Approximate Bayesian Computation</b>
10:15	Talk .16	Pierre Barry - <b>The role of inversions in adaptation and speciation in <i>Littorina</i> multiple evolutionary timescales</b>
10:30	Coffee break	

Chair | Anja M. Westram


11:00	Talk .17(s)	Diego Garcia - <b>Fast and Furious snails: the surprising tale of local adaptation in record time</b>
11:15	Talk .18	April Blakeslee - Phenotypic and genetic characterization of two prominent ecotypes in Northwest Atlantic populations of <i>Littorina saxatilis</i>
11:30	Talk .19	Sarah E. Kingston - <b>What's in a snail? Divergence between moderate (wave-protected) and wave-exposed <i>Littorina saxatilis</i> populations in the Gulf of Maine, Western North Atlantic</b>
11:45	Talk .20	Peter R. Teske - Genomic distinctness of the southern African littorinid snails <i>Afrolittorina knysnaensis</i> and <i>A. africana</i>
12:00	Talk .21	Li-Sha Hu - Phylogeographic structure of periwinkle <i>Littorina brevicula</i> along costal China
12:15	Talk .22	Yun-Wei Dong - Genomic sequencing of Littorinidae snails in China
12:30	Lunch	

## Wednesday 26th

Chair | Elizabeth Boulding

09:00	Talk .23	Sean Stankowski - Selection on many loci drove the origin and spread of a key innovation
09:15	Talk .24	Anja M. Westram - Do snails prefer their home habitat? A mark-recapture experiment across different shore levels
09:30	Talk .25(s)	Ruth Turunen - Mate choice and reproductive barriers in two cryptic intertidal gastropod species <i>Littorina arcana</i> and <i>L. saxatilis</i>
09:45	Talk .26(s)	Luisa Kumpitsch - The role of eusperm in reproductive isolation and sperm competition in <i>Littorina</i> snails
10:00	Talk .27	Laurent Seront - Littorinid behavioral ecology revisited: deciphering the known knowns and unknowns from the known and unknown unknowns
10:15	Coffee break	

Chair | Gray Williams 

10:45	Extended Talk .28	Elizabeth G. Boulding - Effects of a planktotrophic larval stage on the intertidal recruitment of four periwinkles ( <i>Littorina</i> : Gastropoda) during extreme El Niño events: Evaluation of four hypotheses
11:15	Talk .29	Christopher McQuaid - Thermal tolerances of Littorinid snails from temperate and subtropical regions of South Africa
11:30	Talk .30	Sarah L.Y. LAU - Less is more: metabolic depression in tropical high shore littorinids
11:45	Talk .31(s)	Bingqian Han - Phenotypic evidence for local adaptation to heat stress in <i>Littorina saxatilis</i> across small scales
12:00	Talk .32	Laurent Seront - The shade of death: littorinids habitat choice as a key determinant to face heat/cold waves
12:15	Lunch	
Chair   Emilio Rolán-Alvarez 		
14:00	Extended Talk .33(s)	Luis Pereira - Quantification of cardiac performance in mollusks under realistic simulations of intertidal thermal conditions
14:30	Talk .34	Aurélien De Jode - Assembling the new reference genome of <i>Littorina saxatilis</i>

14:45	General Discussion:	Developing <i>Littorinid</i> (online) resources
15:15	Coffee break	
15:30	Group Discussions	
17:30	Conclusions	

## Thursday 27th

Chair | Kerstin Johannesson

09:00	Plenary Talk	Jonathan Henry - <i>Crepidula</i> slipper snails: Key spiralian model organisms for biological research
10:00	Talk .35	Erica H. Leder - Ecotype-specific gene expression related to shell formation in <i>Littorina saxatilis</i>
10:15	Coffee break	
10:45	Talk .36	Jorune Sakalauskaite - <i>Littorina</i> shell ColourBiomes: molecular archives for biomineralization and archaeology

11:00	Talk .37	Caren Shin - Shell shapes over space and time in Pacific <i>Littorina</i>
11:15	Talk .38	Arina Maltseva - Consequences of trematode invasion in <i>Littorina saxatilis</i> snails: transcriptomic, proteomic and metabolomic insights
11:30	Talk .39(s)	Elizabeva Gafarova - Conservative or variable: the composition of microbimoes associated with different Atlantic periwinkles
11:45	Talk .40(s)	Dmitrii Kuriachii - A study of temporal, geographic, and interspecific variability of the microbiome in a model of the related species <i>Littorina fabalis</i> and <i>L. obtusata</i>
12:00	Talk .41(s)	Solène Henry - Foaming at the mouth: direct and indirect exposure to seafoam affect Littorinids change metabolic rate and behaviour
12:15	Lunch	
Chair   John Graham		
13:45	Plenary Talk .42	Gray Williams - Trail following and aggregation formation: an informal ecological review of ISOLBE meetings
14:30	General Discussion	Future prospects in Littorinid research
20:00	Conference dinner	

## Welcome reception



We will start the conference with a Welcome Reception in Vila do Conde, a charming coastal town north of Porto. You can register and enjoy some drinks in a relaxed atmosphere, at one of the most beautiful buildings, the Centro da Memória.

### Venue

Centro da Memória

Vila do Conde

[Website](#)

### Address

Largo de S. Sebastião

4480-706 Vila do Conde

## Conference



The conference will be held in an informal but stimulating scientific atmosphere in beautiful room, providing an excellent opportunity for strong interaction and brainstorming between students and more experienced researchers.

### Venue

Centro Municipal de Juventude

Vila do Conde

[Website](#)

### Address

Avenida Júlio Graça

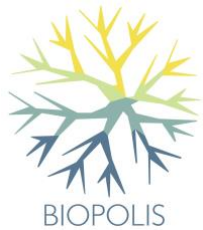
4480-672 Vila do Conde

## Social events



We will do a city tour in the cozy town of Vila do Conde, visit a local beach and a modern gallery in Porto (Galeria da Biodiversidade) where the arts connect with biology and natural history and savour Portuguese cuisine.

## Organization



## Partners



## Funding

