# **2025 ANNUAL CONFERENCE**

ANTWERP 8-11 JULY 2025

SEBIOLOGY.ORG #SEBCONFERENCE





## SESSION TOPICS WILL INCLUDE:

#### **ANIMAL BIOLOGY SESSIONS**

- Multiscale Musculoskeletal Mechanics and Modelling
- Experimental Palaeobiology Bringing Fossils "Backto Life"
- Functional Morphology of Locomotion and Feeding: A Tribute to Peter Aerts
- Kinematics and Robotics state of the arts kinematics and their transfer to robotics
- Innovative Methods and Techniques in Biomechanics
- Open Biomechanics
- Comparative Endocrinology
- Stress as a Driver of Neural Plasticity: From Brains to Behaviour
- Animal Responses to a Changing World: What About Cognition?
- Going Beyond Death: Understanding Ecologically and Physiologically Relevant Impacts of Environmental Toxicants
- Innovating for a Sustainable Future: Mitigating the Environmental Risks of High-Tech Solutions
- · Pollution, Osmoregulation and Energy Use
- Riding The Wave: Insights Into Plastic and Evolutionary Animal Responses to Temperature Challenges
- Open Water: The Biology of Pelagic Fishes
- Biotic Interactions in Freshwater Ecosystems Under Anthropogenic Environmental Change
- The Environmental Causes and Consequences For Offspring of Parental Effects
- Vulnerability and adaptations of early life stages to environmental stressors

- Insights and Tools From Biologging For Conservation Physiology
- Open Animal

### PLANT BIOLOGY SESSIONS

- Accelerating progress in plant science via AI approaches.
- Poisonous Plants
- PEPG Bridging the gap: connecting photosynthesis research from controlled environments to the field
- Cytoplasmic Genetics: From shaping plant traits to driving speciation
- From the Micro to the Macro: Fine Tuning Stomata to Maximise Global Crop Resilience
- Plant Phenomics: beyond the platforms
- · Gravitropism and plant architecture
- Plant engineering strategies for achieving sustainability goals: From models to lab to field
- Open Plant

### **CELL BIOLOGY SESSIONS**

- Cross kingdom Proteostasis: Understading the rules of protein homeostasis'
- Biomolecular Condensates in Plants
- Tip growth in Plant Biology
- Open Cell

## SCIENCE ACROSS BOUNDARIES BIOLOGY SESSIONS

Physiological Genomics

## OUTREACH, EDUCATION & DIVERSITY SESSIONS

- Inclusive Doctoral Education
- Creativity in Higher Education
- Reward and recognition for outreach, education and diversity (OED)
- Collaborative curriculum design for experimental biology practical classes
- Biology as an experimentally-taught science
- Quick Wins Celebrating implementable innovations in HE Teaching and Scholarship
- Enabling learning in a digital world
- Getting your educational research published

#### WORKSHOPS

- Plant Architecture in Model and Crop
- Academic Peer review, first steps best practices, and future challenges
- Intersectionality: Impacts on academic staff and their students
- Embedding SDGs in the Curriculum
- Generative AI and Scientific Writing
- Insights And Tools From Biologging For Conservation Physiology
- The Essential 10 for Responsible Animal Research
- Effective Science Communication and Outreach Programmes
- Gas exchange across scales From leaf to field (and beyond)
- · Understanding Journal Publishing