



Division of Comparative Physiology & Biochemistry

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Stephen Secor
Chair 2014-2016

Inna Sokolova
Chair-Elect 2015-2016

Donald Mykles
Past Chair 2014-2016

Deborah Lutterschmidt
Secretary 2014-2016

Jason Podrabsky
Program Officer 2015-2017

Catherine Dayger
*Student/Postdoc Representative
2015-2018*

Message from the DCPB Chair

Stephen Secor, Chair.DCPB@sicb.org

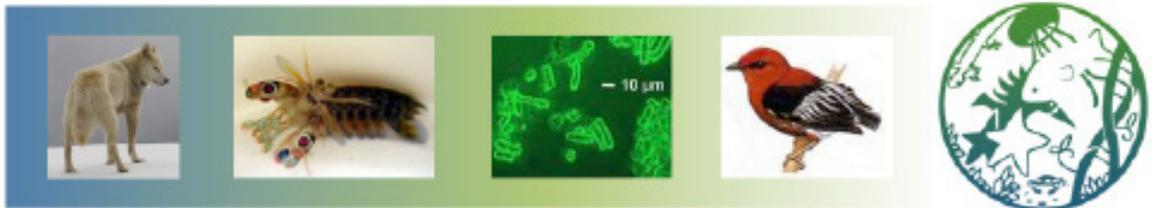
Greetings from Tuscaloosa, Alabama (finally, it has cooled down). I hope that everyone had an enjoyable and productive summer and is looking forward to the upcoming meeting in Portland (I am). This meeting is going to be a big one with more than 1650 abstracts submitted. Nearly 150 abstracts note DCPB as their primary affiliation. DCPB is sponsoring 10 oral sessions as well as the George Bartholomew Award Lecture, which will be held Monday evening. Jason Podrabsky will fill you in with more details on the Portland program in his Program Officer's report. Sheila Patek, Chair of the George Bartholomew Award Committee, will report on the awarding of the Bartholomew Award to Vincent Careau (University of Ottawa). My sincerest thanks to Sheila and the other members of the Bart Award committee for their time and effort in reviewing applications for this most prestigious award.



*Stephen Secor,
University of Alabama*

Once again we are fortunate to have Ana Jimenez coordinate the judging for the DCPB Best Student oral and poster presentations. Please contact Ana (ajimenez@colgate.edu) and volunteer to serve as a judge. This competition is extremely important to our students and the Division, and requires a lot of effort on Ana's part; so, please agree to serve when asked. Thanks.

Deborah Lutterschmidt's two-year term as DCPB Secretary ends after the Portland meeting. Deborah has been a fantastic Secretary and I have been very fortunate that our terms coincide. Robin Warne (Southern Illinois University) will be stepping in after the meeting to continue as DCPB Secretary for the next two years. Also at the end of this meeting, I pass the reins of DCPB Chair over to Inna Sokolova, who for the past year has served as DCPB's Chair-Elect. Inna's first task will be to organize a nomination committee to search for the next Chair-Elect (elections this spring). If you are interested in eventually becoming Chair of DCPB, please let Inna know. As I exit, I welcome the Division's new representative to the Student/Postdoctoral Affairs Committee (SPDAC), Catherine Dayger, a Ph.D.



student at Portland State University. I thank Natalie Pitts, who served as our SPDAC representative for the past several years and wish her the best.

Please attend the DCPB business meeting, which will be held prior to the Bartholomew Award talk. In addition to officer and committee reports, annual reports for *Comparative Biochemistry and Physiology* and *Physiological and Biochemical Zoology* will be given by those journals' editors. We will discuss future venues, meeting programs, and the Division's support of symposia, other meetings, and journals. This is your opportunity to present your concerns and ideas and to be involved. And of course, attend the George Bartholomew Award talk and reception following the business meeting. See you in Portland.

Message from the DCPB Chair-Elect

Inna Sokolova, Chair.DCPB@sicb.org



Inna Sokolova, University of North Carolina at Charlotte

Greetings from the warm and colorful Charlotte, NC! I hope everyone had a wonderful and productive summer rolling into a similarly pleasant and productive fall semester of teaching and research. Judging from the record number of abstracts (1669!) submitted for the SICB meeting

in Portland, OR, everyone was really busy pursuing great research ideas and producing exciting new data to be shared at the meeting. Thanks to you, DCPB continues its long-held tradition as a key contributor to the meeting's scientific diversity and excellence through contributions of individual DCPB members as well as the sponsorship of symposia. In the spirit of what promises to be one of the largest SICB meetings in the society's history, the opening plenary lecture of SICB-2016 is on the biology of big, to be presented by one of DCPB's own, Dr. Terrie Williams from UC Santa Cruz. The division congratulates Terrie on this recognition, and I, for one, am really looking forward to learning what it is that makes life so costly at the top of the food chain! In 2016, the division has also sponsored five symposia on a broad range of cutting-edge topics in comparative and integrative biology including biology of extremophiles, sensory biology of extraoc-

ular, nonvisual and simple receptors, integrative and comparative biology of venom, thermal and climate change biology, and crustacean transcriptomics. The SICB-wide workshops on transcriptomics, building bridges from genome to phenome, and science communication will also be of interest to many DCPB members and align with the scope of scientific interests of the division. Given the record number of abstracts (which will hopefully correlate to the record number of attendees), a healthy mixture of scientists from different disciplines, backgrounds and career stages, and a broad range of scientific topics, the SICB meeting in Portland promises to be a great success and an outstanding venue for exchanging cutting-edge ideas, forging new research networks and collaborations as well as catching up with the old friends. And let's not forget that Portland has the largest number of breweries and microbreweries in the world and some of the best food on the West coast. So bring along your umbrellas and your best science, and see you in Portland!

Message from the Chair of the Bartholomew Award Committee

Sheila Patek



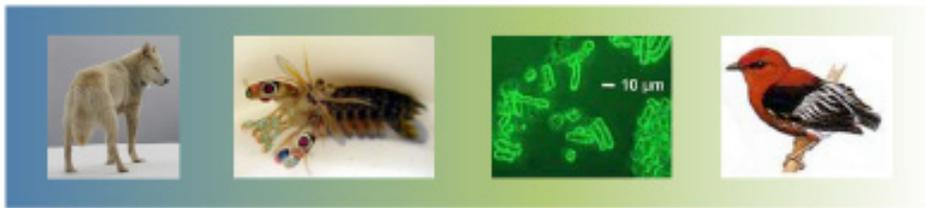
Sheila Patek, Duke University

Dr. Vincent Careau was selected to receive the 2016 George A. Bartholomew Award. Members of the selection committee consisted of Sheila Patek (Chair), Adam Summers, Marty Martin, Bob Cox, and Alison Sweeney.

George Bartholomew Award Recipient

Vincent Careau, University of Ottawa

Dr. Careau completed a B.Sc. degree in Biology at Université de Sherbrooke (2000-2003), a M.Sc. degree at the Université du Québec à Montréal (2004-2006), and a Ph.D. at the Université de Sherbrooke (2007-2010). He then obtained a NSERC postdoctoral fellowship, which he held at the University of California Riverside (2011-2012) and later moved to Australia as an Alfred Deakin Postdoctoral Research Fellow (2013-2015). Dr. Careau is now an assistant professor



Vincent Careau,
University of Ottawa

at the University of Ottawa, where he holds a Canada Research Chair in Functional Ecology. Dr. Careau's research program involves the combination of several approaches (quantitative genetics, comparative methods, experimental evolution, and field studies) to examine trait co-variation across multiple levels of organization (e.g., intra-individual, inter-individual, inter-population, and inter-specific levels). He studies co-adaptations among metabolic rates, performance, behavior, and life-history strategies favored under different ecological conditions.

Message from the DCPB Program Officer

Jason Podrabsky, DPO.DCPB@sicb.org

UPCOMING MEETING HIGHLIGHTS – 3-7 JANUARY 2016, PORTLAND, OREGON

The SICB programming committee met in late September to finalize the program for our upcoming Annual Meeting to be held January 3-7 in Portland, Oregon. This promises to be a great meeting!

The meeting will be held in the Oregon Convention Center located just across the Willamette River from downtown Portland where a great number of restaurants and pubs are easy to stumble upon! There will be childcare available at the meeting; if you are interested in using this service, please complete the [child care survey](#) by November 15. Portland is a great family-friendly city with lots of parks, gardens and other attractions (OMSI, Oregon Zoo) just a short train ride away. A housing bureau called Travel Portland is managing hotel reservations for the meeting. To make reservations please click on the appropriate link on the meeting website. The headquarters hotel is the Doubletree by Hilton Hotel Portland that is located just a few blocks away from the Convention Center. There are many other hotels conveniently located that may also offer competitive pricing.

When arriving in Portland your best bet for getting into town is to take the MAX light rail train. The MAX



Jason Podrabsky,
Portland State University

terminal is located at the SW corner of the Airport terminal – just follow the signs towards ground transportation and take a right as you exit the airport terminal. Remember to purchase a MAX pass BEFORE getting on the train using the pay stations near the train terminal. Only purchase a 2.5-hour ticket for the ride into town though, because a one-week TriMet pass will be given to all meeting participants at registration. This TriMet pass is valid on all forms of public transportation in Portland (MAX light rail, buses, Portland Street Car). This pass is important because many of the great bars and restaurants are only a 5 min ride away, but they are across the river and January can be a little cold and wet in Portland!

SYMPOSIA

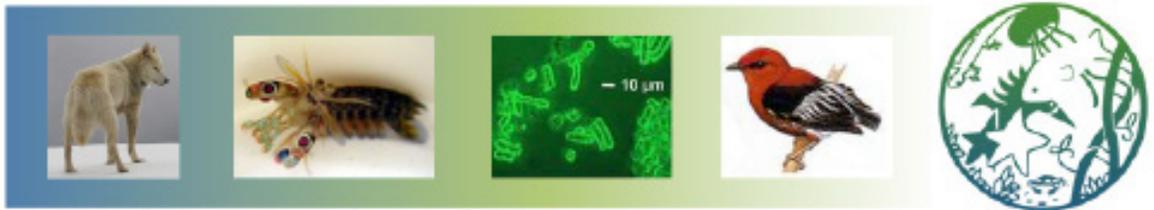
DCPB is represented by a strong contingent of abstracts this year including:

- 113 oral presentations in 10 sessions that represent a diversity of physiology topics including: energetics and metabolism, thermal physiology, water and ion homeostasis, and digestive, respiratory and reproductive physiology
- 75 posters in physiologically-themed poster sessions
- 148 abstracts with DCPB as the primary division affiliation
- 57 entrants in the DCPB Best Student Presentation competition
- around 50% of the submitted abstracts are contributed by students

DCPB has co-sponsored 5 symposia for this meeting:

[Life on the Edge: the Biology of Organisms Inhabiting Extreme Environments](#)

Organizer: Annie Lindgren; Sponsors: DCPB and DVM



Extraocular, Nonvisual, and Simple Photoreceptors

Organizers: Thomas Cronin and Sonke Johnsen;
Sponsors: DCPB, DIZ, DNB, and AMS

Integrative and Comparative Biology of Venom

Organizers: Marymegan Daly and Lisle Gibbs; Sponsors: DCPB, DEE, DIZ, DNB and DPCB

Beyond the Mean: Biological Impacts of Changing Patterns of Temperature Variation

Organizers: Michael Dillon, Art Woods and Michael Sears; Sponsors: DAB, DCE, DCPB, DEE, and DIZ

Tapping the Power of Crustacean Transcripts to Address Grand Challenges in Comparative Biology

Organizers: Donald Mykles, Karen Burnett, David Durica and Jonathon Stillman; Sponsors: TCS, DCE, DCPB, DEDB, DIZ and DNB

Don't forget to attend the DCPB business meeting on Monday, January 4, 2016, at 5:45-6:30 PM, followed by the Bartholomew Award lecture at 7:00-8:00 PM and the DCPB-sponsored Bartholomew Award social following the lecture and running until 9:30 PM.

FUTURE SYMPOSIA

If there are topics you think would make an excellent symposium, I encourage you to contact me now to start talking about symposium proposals for San Francisco in 2018 and Tampa in 2019 – time really flies and you can never start too soon!

I look forward to seeing you in January!

Message from the DCPB Student/Post-doctoral Affairs Committee

Past SPDAC Representative, *Natalie Pitts*



Natalie Pitts, Colorado State University

I want to thank DCPB for allowing me to act as the SPDAC representative. Sadly I must end my term early, as I will be graduating this December. It was a pleasure working with all of you and I hope my successor enjoys this opportunity as much as I have. Have a wonderful time in Portland!

Congratulations to our new SPDAC representative!

Catherine Dayger, cdayger@pdx.edu



Catherine Dayger, Portland State University

I am excited to be appointed as the new DCPB Student/Post-doctoral Affairs Committee representative. I would like to send a warm thank you to Natalie Pitts for the great work she did as my predecessor. I look forward to contributing to the SPDAC-sponsored workshop at the Portland meeting in January. Also at the Portland meeting, there will be a Society-Wide Social in Honor of Students and

Postdocs with refreshments. I hope you will take the opportunity to introduce yourself to me at the social and share how the Student/Post-doctoral Affairs Committee can best serve you.

Finally, I want to make sure that our student SICB members are aware of some of the great funding opportunities available to them, including the SICB [Grants-In-Aid of Research](#), [Fellowship for Graduate Student Travel](#), [Broadening Participating Travel Award](#), and the [Dorothy M. Skinner Award](#). I hope that you will keep these applications in mind for future meetings!

Message from the DCPB Secretary

Deborah Lutterschmidt, Secretary.DCPB@sicb.org

Deborah Lutterschmidt, Portland State University

Welcome to another DCPB Fall Newsletter, and my last as Divisional Secretary. Robin Warne will take over as Secretary at the end of the Portland meeting and will serve a two-year term of office through the January 2018 meeting in San Francisco. I am grateful for the opportunity to contribute to the DCPB as Secretary, and have thoroughly enjoyed working with the





Divisional Officers and the DCPB members these past few years. Thank you for a great term of office!

The DCPB will be electing a new Chair-Elect this spring as Stephen Secor hands over the reigns of Divisional Chair to Inna Sokolova. The new Chair-Elect will serve a one-year term from 2017-2018 before taking over as Chair from 2018-2020. If you are interested in standing for election for DCPB Chair, please let Stephen or Inna know via email (Chair.DCPB@sicb.org) or during the Portland meeting.

Please join me in thanking our Best Student Presentation Judging Coordinator, Dr. Ana Jimenez (Colgate University).

As always, there are a lot of entries (57!) in the Best Student Presentation Awards competition for DCPB. This means the DCPB will need your help in judging these great presentations during the annual meeting. If you have not yet indicated your interest in serving as a judge for DCPB during meeting registration, please email Ana at (ajimenez@colgate.edu). My sincere thanks to Ana for her willingness to serve the Division in this very important aspect of student and post-doctoral fellow support.



Ana Jimenez, DCPB Student Presentation Judging Coordinator

I look forward to seeing many of you in my hometown of Portland! If you have any questions about the area or if there is some news you would like announced to the DCPB membership, please don't hesitate to contact me at Secretary.DCPB@sicb.org. Thanks to all of our members for your continued support of the DCPB, and a sincere welcome to Robin Warne as he takes over as Divisional Secretary.

Message from the Incoming DCPB Secretary

Robin Warne, Secretary.DCPB@sicb.org



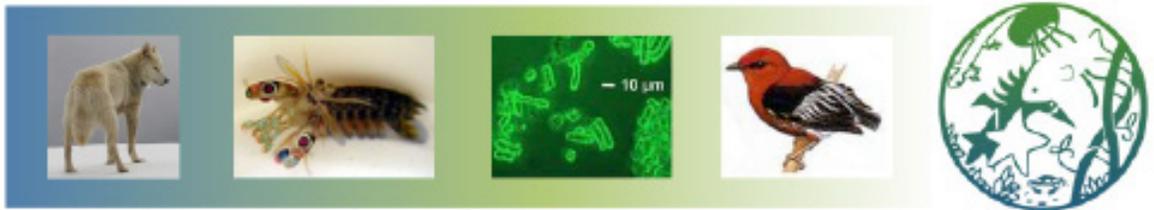
Robin Warne,
Southern Illinois University

I am pleased and honored to be elected as the next DCPB Secretary, with my term starting in January 2016, after the Portland, OR, meeting. I look forward to working with the members of this division, and contributing to this great organization! I also wish to thank Deborah Lutterschmidt for her great work as our DCPB Secretary during

the past couple of years. If you have news or anything you would like to discuss regarding DCPB, or would just like to say hello, please seek me out in Portland.

Call for Manuscripts for Special Issue of *Physiological and Biochemical Zoology*

Physiological and Biochemical Zoology is soliciting manuscripts for review for a Focused Issue on: Early-life Effects on the Adult Phenotype: a Comparative Perspective. Adult organisms are the result of ontogenetic development that is fundamentally guided by the genome, but is also modulated by environmental factors. In general, environmental influences early in life are particularly likely to have lasting effects, and yet are often difficult to identify. For example, numerous studies show that humans who experience nutritional stress early in life (e.g., around conception) have altered adult phenotypes at both behavioral and physiological levels. Further studies, especially with rodents, show that these effects may have an epigenetic basis, caused by such mechanisms as methylation of particular DNA sequences. Moreover, work on rodents, fishes, and insects demonstrate that some early-life effects may cross generations (e.g., grand-offspring may be impacted).



Now soliciting manuscripts
for a Focused Issue on:
*Early-life Effects on the Adult
Phenotype: a Comparative Perspective*



Submit by February 15, 2016

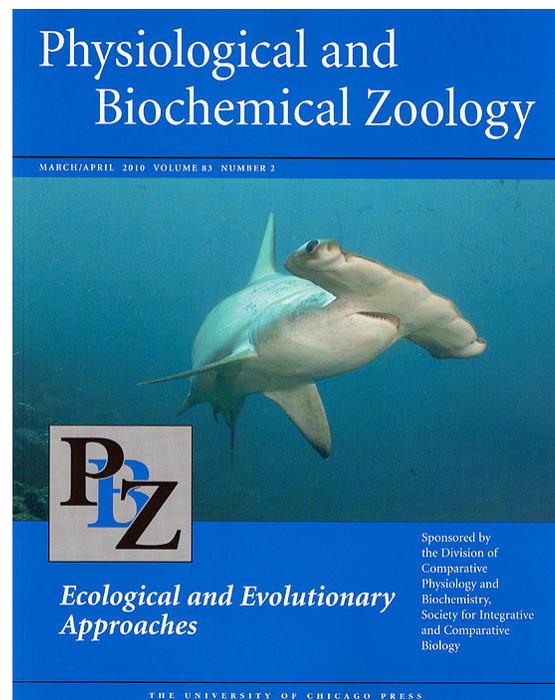
Topics of interest for the focused issue include, but are not limited to:

- Parental effects
- Developmental plasticity and critical windows
- Acclimation and acclimatization
- Effects of altered biophysical conditions (e.g., hypoxia, environmental acidification, climate change) during embryonic stages on subsequent development, growth, and performance
- Epigenetic mechanisms underlying early-life effects on adult phenotypes
- Impact of parental stress on development (including in utero and other maternal effects)
- Compensatory mechanisms of developing physiological systems
- Role of the endocrine system in early-life effects
- Long-lasting effects of toxicants experienced during early life

Empirical studies should be hypothesis-driven and examine the ontogeny of behavior, morphology, physiology or biochemical function. Studies on model organisms as well as nontraditional species and humans are welcomed, but all submissions must offer insights relevant to the ecology, evolution or behavior of the organisms under natural conditions.

Both short and comprehensive review or synthesis papers will be considered for this Special Issue (prior to submitting a review, contact the Editor in Chief (tgarland@ucr.edu) directly to discuss possibilities). Note that PBZ also considers Brief Communications, Technical Comments, and papers related to Education and Outreach. All manuscripts should conform to the usual formatting requirements for PBZ (please check our website), and all will receive rigorous peer review via our standard double-blind process. Papers will be published in early 2017.

Deadline for Submissions: Submit manuscripts to <http://www.editorialmanager.com/pbz> by February 15, 2016. Please identify the manuscript as a Special Issue submission.



Judges needed! Please support DCPB's students and postdocs by serving as a judge for the Best Student Presentation Awards competition!