



Boreus

Newsletter of the Entomological Society of British Columbia



December 2011
Volume 31 (2)



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The Royal B.C. Museum crew visits the UBC Spencer Collection, November 30, 2010. James Miskelly and Rob Curtis (1st photograph); Claudia Copley (2nd photograph); Robb Bennett and Darren Copley (3rd photograph). Photographs by Jennifer Heron.



The Executive



The Entomological Society of British Columbia is a scientific Society founded in 1902 for the advancement of entomological knowledge in the province.



Snakefly, photograph by Bernie Roitberg.

President	Ward Strong BC Ministry of Forests & Range, Vernon
President-Elect	Mike Smirle Agriculture and Agri-Food Canada, Summerland
Past-President	Rob McGregor Douglas College, New Westminster
Secretary	Leo Rankin B.C. Ministry Forests & Range, Williams Lake
Treasurer	Lorraine Maclauchlan B.C. Ministry of Forests & Range, Kamloops
Editorial Committee (Journal)	Dezene Huber (Editor) University of Northern B.C., Prince George Hugh Barclay (Assistant Editor) Canadian Forest Service, Victoria Robert Cannings, Royal B.C. Museum, Victoria Lorraine Maclauchlan B.C. Ministry Forests & Range, Kamloops Bob Lalonde University of British Columbia – Okanagan, Kelowna Steve Perlman University of Victoria, Victoria Leland Humble Canadian Forest Service, Victoria
Editors (Boreus)	Jennifer Heron B.C. Ministry of Environment, Vancouver Jeremy deWaard Royal B.C. Museum, Victoria
Directors	Dezene Huber (2 nd) University of Northern B.C., Prince George Arthur Stock (2 nd) B.C. Forest Service, Nelson Tracy Hueppelsheuser (2 nd) B.C. Ministry of Agriculture and Lands, Abbotsford Susanna Acheampong B.C. Ministry of Agriculture, Kelowna Maxence Salomon University of British Columbia, Vancouver
Student Representative	Chandra Moffat UBC - Okanagan, Kelowna
Honorary Auditor	Rob McGregor Douglas College, New Westminster
Regional Director of National Society	Bill Riel Canadian Forest Service, Victoria
Website Editor	Alex Chubaty Simon Fraser University, Burnaby
Web Page	http://blogs.sfu.ca/groups/esbc



Publications of ESBC



Journal of the Entomological Society of British Columbia

The Journal of the Entomological Society of B.C. is published annually. Papers for the Journal need not have been presented at meetings of the Society, nor is it mandatory, although preferable, that authors be members of the Society. The chief condition for publication is that the paper has some regional origin, interest or application. Line drawings or photographs as candidates for the cover are also accepted. Contributions should conform to the standards outlined in the Journal and the Website (<http://www.sfu.ca/biology/ESBC/>), and should be sent to the Editor, Dr. Dezene Huber, University of Northern British Columbia, Prince George, 250-960-5119, email: huber@unbc.ca

The deadline for submissions to be included in the 2012 issue is September 1, 2012.



Boreus

Boreus, the Newsletter of the Society is published in June and December. It contains entomological news, comments, reports, reviews and notices of meetings and other events. While emphasizing the Society's affairs, Boreus provides members with a forum for their views and news of British Columbia entomology, as well as informal articles, notes regarding research projects, and anything else that may be of interest to entomologists. Please send correspondence concerning Boreus to the co-editors Jennifer Heron and Jeremy deWaard (Jeremy.deWaard@gmail.com), or the new dedicated Boreus email account (editorboreus@gmail.com).

The deadline for submissions to be included in the June issue is May 15, 2012.



Membership

Membership of the Entomological Society of B.C. is available to anyone interested in entomology. Annual dues are Can\$20.00 (regular member) or Can\$10.00 (student member). Members receive the Journal, Boreus and Occasional Papers (the latter published intermittently).

Inquiries concerning membership and back issues should be sent to the Treasurer, Dr. Lorraine Maclauchlan, B.C. Ministry of Forests, 515 Columbia Street, Kamloops, B.C., Canada V2C 2T7; tel 250 828-4179; fax 250 828-4154; e-mail: Lorraine.Maclauchlan@gov.bc.ca

Cover Sketch: *Boreus elegans* (Mecoptera: Boreidae); one of the more conspicuous snow scorpionflies in B.C. Larvae and flightless adults live in, and feed on, moss and clubmoss. Adults appear in the fall and are active on snow on warm winter days. Credit Ward Strong and Robert A. Cannings.

Cover Photographs: Photograph by Bernie Roitberg.



Dragonfly in downtown Tokyo, photograph by Simon Zappia.



Society Business

Regional Director's Report

The 2011 JAM is being hosted this year by the Acadian Entomological Society. The meeting is to be held at the Westin Nova Scotian Hotel, Halifax, Nova Scotia, from November 6th to November 9th, 2011. The meeting web site is up and running and can be found at:

<http://www.acadianes.ca/2011jam/>

The 2012 JAM will take place in Edmonton, AB: dates to be announced.

The Entomological Society of Canada has been approached by the Vancouver Convention Centre (VCC) regarding the possibility of hosting the 2016 International Congress of Entomology. Before responding to this request, the ESC would like to know if the ESBC has any appetite for hosting this meeting. It would be a joint venture between the ESC, ESBC and the VCC, but clearly the ESBC would have some significant responsibilities if a bid to host this meeting is going to be prepared. It is worth noting that the Entomological Society of America does have a bid in to host this meeting in Orlando, Florida so a Vancouver bid would be in direct competition to this bid.

The VCC would offer considerable help, and have confidence that a world class bid could be prepared. However, the first step is to determine the interest the ESBC has in this. For more information, I have attached a document showing the requirements for bids to host the International Congress of Entomology.

Bill Riel
Regional Director of National Society



Torymus azureus female parasitoids probing for larvae of the spruce cone axis midge, *Kaltenbachiola rachiphaga*, in a spruce cone at the Kalamalka Seed Orchards in Vernon BC. Photograph by Nancy van der Laan.



Nymphs of the pine spittlebug, *Aphrophora* sp., feeding on a lodgepole pine cone at the Bailey road Seed Orchards near Vernon BC. Photograph by Jim Corrigan.



ESBC Secretary Report

I have had to deal with only a few minor enquiries and comments which were directed to me. I moved eight boxes of old surplus journals and assorted boxes of secretarial material from Lorraine's office to our warehouse where it is currently stored. I plan to move it to our herbarium in our office, which is temperature controlled. In that controlled environment I can sort it and organize it at leisure. However I had a couple of questions regarding storage of all this historical material. How many hard copies of old journals do we need to keep? Are all the JESBC saved in digital form as well? Should we dispose of surplus journals?

The ballots for the ESBC officers' elections were sent out. The election was for two directors and the President-Elect. There was only one candidate for the President-elect and two candidates for the two director positions so everything was very straight forward. Members had the option of adding a write-in candidate. No write-in candidates were submitted during the voting. Approximately 40% of the ballots were returned which I feel is good response considering that the candidate choice was limited.

ESBC Officers Election Results were as follows:

President-Elect: Mike Smirle

Directors:

Susanna Acheampong

Maxence Salomon

I reviewed the e-mail and address list and edited it based on returned e-mails and letters. I am hoping to pare it down more after discussion with the Treasurer and remove surplus non-members. The review of duties of treasurer and Secretary has not been started. I thought this would be easy task but Lorraine, Tom and I did not meet to work out the job separation. This will be a priority over the winter.

Leo Rankin
ESBC Secretary



Admetovis oxymorus, photograph by Norbert Kondla.



Web Editor's Report

As the new web editor, I look forward to serving the ESBC, and I have several ideas to help revamp and improve the website to better serve both the membership and the general public. In the past few weeks, with the help of SFU computing staff, I have migrated the existing website over to a content management system (CMS) called WordPress. WordPress is a popular blogging and dynamic website delivery platform which offers many advantages over traditional static html websites, and is provided (for free) to SFU courses, departments, faculty, and other SFU-related research groups, including the ESBC.

The major advantage of using a CMS is that updates and uploads to the site are now done through a browser-based administrator panel, and do not require knowledge of html nor css. Furthermore, customization and future redesigns of the site's look and feel can easily be accomplished by applying a new WordPress theme. Prior to moving to a CMS, such transitions required having to manually recode and transfer all existing content. Using a CMS, the database which contains all of the site content can be easily migrated and transferred and the look and feel of the site can be easily modified.

Recent updates to the website include:

- The old site (<http://www.sfu.ca/biology/esbc/>) now redirects to the new one (<http://blogs.sfu.ca/groups/esbc/>), but some [older] content is still hosted on the old site and linked via the new one;
- Announcements are now made on the main page through a blog-style interface that allows commenting and trackbacks (for visitors reposting our announcements on their own sites);
- All static information pages (e.g., journal, contact, membership info) are provided (but do not allow comment nor trackbacks).

I hope to continue to transform the site to match the style and feel of many popular sites, and to integrate social networking and social media functionality such as the ability to easily share links as well as deliver members-only content to add further value to an ESBC membership, foster a sense of online community, and provide content which encourages repeated visits to our website. I think our goal should be to not only bring more visitors to the site but to also encourage more frequent, repeated visits.

Future updates proposed:

- Development of a custom ESBC theme (colour scheme and layout);
- Integrating photos and other forms of media on the site, as banner images and in members-submitted galleries;
- Add user accounts to the site on an ad hoc basis for now, with the possibility of setting up accounts for all ESBC members (these user accounts would allow access to members-only content and posting comments – see below);
- Development of a members-only content and access, including the ability to leave comments on the site and to post in forums;
- Development of a students' area, with content directly aimed at current and potential grad students (I will coordinate and discuss this further with Student Rep, Chandra Moffat);



- Have a public section of the site, perhaps a forum where the public can submit photos of insects for identification.

I am eager to find volunteers who want a user account to test some of the proposed new features. Interested members should be in good standing and can contact me via email (achubaty@sfu.ca).

Possible challenges:

- Spam! Allowing visitors to post comments introduces the potential for abuse. Since setting up the new site, I have had to make comments semi-moderated and been filtering spam postings. I will work with SFU computing staff to arrange a better anti-spam solution;
- SFU does not provide support for custom themes or for some WordPress modules and extensions, which may limit how quickly I can get some of the proposed new features implemented on the new site.

I welcome comments and suggestions for the new site.

Alex Chubaty
ESBC Web Editor



Taylor's Checkerspot (*Euphydryas editha taylori*) on Denman Island, 2009, Photograph by Jennifer Heron.



Editor's report – Journal of the Entomological Society of British Columbia

Current editorial board:

- Dezene Huber (*Editor-in-Chief*; huber@unbc.ca)
- Hugh Barclay (*Assistant Editor*)
- Lorraine Maclachlan
- Robert Cannings
- Steve Perlman
- Robert Lalonde
- Lee Humble
- Rob McGregor

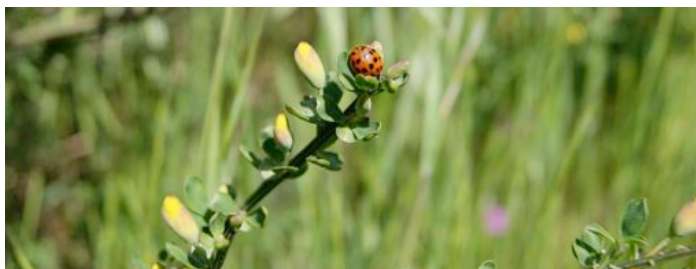
Manuscripts for 2011:

Eight manuscripts have been submitted for consideration for inclusion in the 2011 issue. Of those, four have been accepted, one has been withdrawn, one was rejected, and the two others are in various stages of the review process.

Other:

- We have instituted a common spreadsheet that is accessible and modifiable by members of the editorial board. This has helped with tracking manuscripts as they move through the review process and beyond.
- As you are aware, we have moved toward an open access model in which papers will be available online as soon as they are published. There have been no problems, so far, with this transition.
- Our previous typesetter has gone on to new adventures. We are pleased to bring Tanya Stemberger on board as our new typesetter. Ms. Stemberger has already started to work on typesetting the accepted manuscripts for 2011.
- We have been paying our typesetter \$25/hour for the past ten years. We would like to recommend increasing the rate to \$30/hour to attempt to keep in line with inflation and cost of living.
- I would like to thank my extremely helpful editorial staff. Because I am completely new to this, I thoroughly appreciate their help and advice as I move along the learning curve.
- Please encourage your colleagues to submit their relevant, high quality manuscripts to our journal!

Dezene Huber
JESBC Editor-in-Chief



Random Coccinellidae, Mount Douglas Saanich Park, May 10, 2011. Photograph by Jennifer Heron



Graduate Student Director's Report

Student Engagement: Formation of a Student Affairs Committee

Ensuring entomology students from all BC Universities have equal opportunity to access ESBC and provincial entomology related information and events is one of my goals as current Graduate Student Director. In an effort to assist with student and university engagement across the province, I propose to form a Student Engagement Committee, and solicit entomology students from each BC University to be a part of this committee. At least one student from each BC University/Campus that has ongoing entomological research (SFU, UNBC, UVic, UBC Vancouver, UBC Okanagan, possibly UFV, TRU, VIU and any other institutions I have left out) will be sought to serve as a University Representative, with a priority on the first five universities. Students could be invited or suggested to join the Committee. Once the Committee consist of three regular members, the inclusion of subsequent members would be conducted by vote of the regular members. The Student Representative would be a regular member and *defacto* Chair of such a committee, may be a University Representative, and would be responsible for finding students to represent as many universities as possible and leading committee activities. The ESBC President and Web Director are asked to serve as *ex officio* members of the Committee, and in such a case that either of the above are students, may also serve as a University Representative on the Committee. These two *ex officio* members would not be required to participate in regular correspondence, but would receive updates of Committee Activity. I propose to form such a Committee immediately.

Student Engagement: ESBC Website

The new Web Director, Alex Chubaty, and I have recently engaged in discussions regarding increasing Student Engagement through the new ESBC website. Some ideas include: adding a job/research board for student and non-student postings, a directory of regular and adjunct professors that have entomology related research programs in BC, and an undergraduate research/experience page that lists university co-op programs and other ways to gain entomological experience. The content of these pages would be built by the proposed Student Engagement Committee.

Chandra Moffat
ESBC Graduate Student Director



Western Branded Skipper (*Hesperia oregonia colorado*) specimens from the Royal B.C. Museum. This species is up for assessment by the Committee on the Status of Endangered Wildlife in Canada.

Photograph by Jennifer Heron.



Treasurer's Report

Approximately 110 members have paid either 2010 and/or 2011 ESBC dues. A number of members are in "arrears" or are "lost-in-the-woods" (incorrect address or email). 82 members (regular and student) paid by cheque or cash over the past year. Special note that Dezene Huber is now paid up for 7 years! Subscribers are requesting 2011-12 subscription cost so we need to determine what the new cost will be for memberships and subscriptions. Sixty-two (62) 2010 journals were mailed to subscribers (domestic and international). Paid memberships and subscriptions remain stable at about 172.

Page charges received for JESBC was \$1,626.46 and payment for subscriptions was \$1,287.85.

Total contributions and donations to the ESBC over the past year was \$1,320.00. These funds are toward scholarships and educational activities. Various individuals have contributed, as well as the North Okanagan Naturalists (\$300) and Valent BioScience (\$500). ConTech (formerly PheroTech) is no longer contributing to the ESBC Scholarship fund.

The Islands Savings Credit Union investment savings in term deposit is \$20,000 for a 5 year term (interest rate 3.35%). There is currently \$2,330.54 in a Savings that should be transferred to the primary ESBC account. The term deposit at the Interior Savings Credit Union totals (\$19,475.00) matured March 31, 2011, and \$15,000.00 was re-invested in a 36 month Term Deposit (at 2.5%). The difference (\$4,475.00) was transferred to the ESBC chequing account.

The current balance in the Interior Savings chequing account is \$9,612.94 (October 9, 2011). There are subscriptions and membership dues still to come in. The current balance, including Term Deposits, Savings and chequing account, is approximately \$46,943.48.

Lorraine Maclauchlan
ESBC Treasurer



Lacewing eggs on gala apple Hartmann Orchard Osoyoos BC
September 2011. Photograph Lynn Westcott.



Description	Credits	Debits
Regular & student memberships	\$1,765.23	
Subscriptions	\$1,355.80	
JESBC page charges	\$1,626.46	
Typesetting JESBC		\$550.00
Shipping charges to send JESBC to Kamloops		\$70.00
Postage to mail JESBC to members		\$524.87
Poster boards for 2010 ESC/ESBC JAM		\$1,142.40
Typesetting JESBC winter 2010		\$450.00
Postage to mail JESBC to subscribers		\$385.79
		\$3,123.06
ESC/ESBC JAM logo design (Michael Blackstock)		\$850.00
The Coast Plaza - deposit for joint meeting venue		-\$2,000.00
ESC/ESBC logo prints & shipping - Pacific Editions Ltd.		\$724.80
ESC/ESBC logo prints & shipping - Pacific Editions Ltd.		\$1,020.00
		\$2,594.80
Donations to the ESBC (see detailed table attached)	\$1,320.00	
	Totals	\$6,067.49
		\$6,267.86

Summary of Bank accounts

Interior Savings Credit Union - deposit from member rewards	-\$48.18
Interior Savings Credit Union - cash flow (includes rewards)	\$9,612.94
Interior Savings Credit Union - Term Deposit (36 mths @2.5%)	\$15,000.00
Island Savings Credit Union - savings (includes shares)	\$2,330.54
Island Savings Credit Union - shares	-\$5.00
Island Savings Credit Union - Term Deposit (5 yr @ 3.35%)	\$20,000.00
	\$46,943.48

Statement prepared October 13, 2011
 Lorraine Maclauchlan, ESBC Treasurer

Audited -

Tom Lowery, Past President



Donations made to the ESBC

Donor	Amount (\$)	Explanation
John Dale	\$10.00	gift 2010
ESC	\$200.00	Education fund (Derna Lisi)
Valent BioSciences Canada Ltd.	\$500.00	Contribution to ESBC Student Awards
ESBC Presidents Prize & other	Amount	Comments
Sheila Fitzpatrick	\$100.00	President's Prize
Rob McGregor	\$50.00	President's Prize
Leo Rankin	\$20.00	President's Prize
Jim Corrigan	\$20.00	President's Prize
Lorraine MacLauchlan	\$20.00	President's Prize
Tom Lowery	\$100.00	President's Prize
North Okanagan Naturalists Society P.O. Box 473 Stn. Main Vernon, B.C. V1T 6M4 c/o Kay Bartholomew	\$300.00	
\$1,320.00		



Photograph Bernie Roitberg.



Student Affairs

Graduate Student Director's Note

It was great to see so many students at the 2011 Annual General Meeting of the ESBC! We had two very enjoyable days that included several student talks on the Friday in Abbotsford, and my lab mate, UBC Okanagan PhD Candidate Haley Catton was invited to speak on her research at the Invasion Biology Symposium on the Saturday at Douglas College. Good job, Haley! Congratulations also go to the Student Oral Presentation Awards winners: Tanya Stemberger, Erfan Vafaie, and Ikkei Shikano, who all gave great talks.

Student Engagement Committee

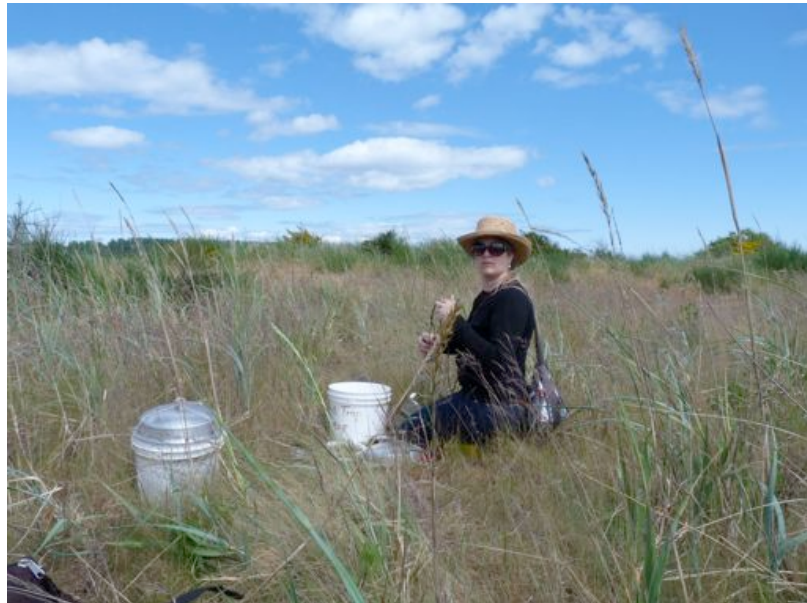
We are currently looking for representatives from each BC university to join the Student Engagement Committee of the ESBC. This group will work towards compiling and posting student-relevant information and make it available to the student membership through the revamped site and new [Facebook](#) and [Twitter](#) portals. If you are interested in being the representative for your university, please contact me for more information.

Graduate Student Director Position 2012-2014

Well, time really does fly! It is already time to start looking for a new Graduate Student Director. I will hold the position until the 2012 AGM, but the candidates running for the position will be announced in the June 2012 edition of *Boreus*, so best to start thinking about this now! If you are interested in knowing more about the position and possibly running, please do not hesitate to contact me!

That's all I have for now –
please feel free to contact me
anytime!

Chandra Moffat
Graduate Student Director



Jennifer Heron setting up moth traps at Cordova Spit, Vancouver Island. Photograph by Lea Gelling.



Announcements

BC Parks Great Ranger Experience

As you know, BC Parks is celebrating its' 100th birthday this year. To help celebrate we thought it would be fun to capture what Park Rangers are up to in BC Parks in a series of short videos. The goal of the Great Ranger Experience video project is to showcase the passion of Park Rangers in our centennial year, feature the some of the magical provincial parks, and then share the videos through social media tools. We have just wrapped up production, the videos turned out fantastic, and now we want share them with all of BC Park's friends.

Check out the videos, and please share these videos with colleagues, friends and family. Our hope is that viewers like you will share video links to the project through social media. So please post the videos on your Facebook or tweet the link on your twitter account. Enjoy!

Below are the links you can share:

BC Parks – Great Ranger Experience Playlist:

<http://www.youtube.com/playlist?list=PL98F546CAAF58723>

- Bugaboos video - share link: <http://youtu.be/7Xbh8h4DG3Y>
- Grasslands video - share link: <http://youtu.be/tZkd-dYbDGk>
- Marine Parks – share link: <http://youtu.be/EK9m805TYFA>
- Garibaldi - share link: <http://youtu.be/pptou17ITml>

BC Parks host site:

www.greatrangerexperience.ca

Special thanks to the Great Ranger Experience production team:

Alex Lavigne – Alias Cinema, Film production

Shawn Hall – Old Sofa Music, Music production

Becs Hoskins – BC Parks, Production and coordination

Jenn Pouliotte – Climate Action Secretariat, Production and coordination

Tammy Liddicoat & Rob Fiddler– BC Parks, Web support

Jim Gilliland & Nathalie – BC Parks, Parks 100 program support

And a BIG thanks to all of the Park Rangers who you will meet in the videos



**Entomological Society of British
Columbia
Annual General Meeting
October 14, 2011**

**Room B121, Building B
University of the Fraser Valley
33844 King Road, Abbotsford, BC**

900-915 **Welcome** – Rob McGregor (President ESBC)

First Session (Moderator: TBA)

915-930 Rob McGregor & Chloe Hemsworth - Olfactory responses of *Micromus variegatus* (Neuroptera: Hemerobiidae) to pepper leaves infested with *Myzus persicae* and *Aulacorthum solani* (Homoptera: Aphididae).

930-945 Chandra Moffat, Robert Lalonde & Jason Pither - Cryptic diversity of a candidate weed biological control agent.

945-1000 Gabriella Zilahi-Balogh - Update on Balsam woolly adelgid in BC.

1000-1015 Scott Johnson, Tom Lowery, Jenny Cory & Joan Cossentine - Mycosis at cool temperatures: the susceptibility of the temperate grape cutworm *Abagrotis orbis* to entomopathogenic fungi.

1015-1030 Ikkei Shikano & Jenny Cory - Resistance to *Bacillus thuringiensis* alters macronutrient selection in the cabbage looper, *Trichoplusia ni*: Effects on performance and disease resistance.

1030-1100 **COFFEE BREAK** (Coffee and refreshments provided)



Random shots from the ESBC AGM, photographs by Jennifer Heron.



Second session (Moderator: TBA)

1100-1115 Erfan Vafaie, Sheila Fitzpatrick & Jenny Cory - The influence of natal host on the fecundity of the parasitoid, *Praon unicum*, on the blueberry aphid, *Ericaphis fimbriata*.

1115-1130 Chelsea Eby, Mark Gardiner, Regina Gries, Gary Judd & Gerhard Gries - Identifying feeding attractants from showy milkweed flowers for potential control of the apple clearwing moth.

1130-1145 Patrick Lilley - Supporting Butterfly Conservation in British Columbia: The BC Butterfly Atlas

1145-1200 Letitia Da Ros - Estimating the impact of arthropod predators preying upon lygus nymphs in the Peace River region of Canada.

1200-1215 Maxence Salomon - Group morphology affects foraging success in social spiders.

1215-1315 LUNCH (Lunch provided)

Third session (Moderator: TBA)

1315-1330 Jennifer Heron - TBA

1330-1345 Franz Simon & David Gillespie - Aphid mummies provide parasitoids with a temporal refuge from predation by ladybird *Harmonia axyridis*.

1345-1400 Tanya Stemberger - The effects of experience on intermale competition in the Western Black Widow spider.

1400-1415 Lorraine Maclauchlan - A century of outbreaks: tracking the western spruce budworm in B.C.

1415-1445 COFFEE (Coffee and refreshments provided)

1445-1515 ESBC Business Meeting

1515-1530 Announcement of student presentation winners



Random shot from the ESBC AGM, photographs by Jennifer Heron.



**Entomological Society of British Columbia
Symposium: INVASION BIOLOGY!
October 15, 2011**

**Room 2201
Douglas College
700 Royal Avenue, New Westminster, BC**

Welcome – Rob McGregor (President ESBC)

900-930 Dave Gillespie - Climate change and invasion potential.

930-1000 Haley Catton, Rosemarie De Clerck-Floate & Robert Lalonde - Interpreting the effects of a biocontrol weevil released to control houndstongue (*Cynoglossum officinale*) on its target weed and a native nontarget plant.

1000-1030 Lee Humble, MK Noseworthy, Jeremy deWaard & Tracy Hueppelsheuser - Recent detections of non-indigenous species in British Columbia.

1030-1100 COFFEE BREAK (Coffee and refreshments provided)

1100-1130 Gabriella Zilahi-Balogh - Policy, regulation and invasives: role of CFIA.

1130-1200 Rob Higgins - The European Fire Ant (*Myrmica rubra*) in British Columbia.

1200-1230 Tracy Hueppelsheuser & Susanna Acheampong - Spotted Wing Drosophila in the Southern Valleys of British Columbia, Update on this new invasive fruit pest, 2010 – 2011.

1230-1330 LUNCH (Lunch provided at the Amelia Douglas Gallery 4th floor with Insect Art Exhibit by Tiko Kerr & Ivan Droujinin)



Random shots from the ESBC AGM, photographs by Jennifer Heron.



Sweep of the Net

A miscellany of recent entomological media caught on the internet.

Audio podcast from CBC's 'Quirks and Quarks' about whiteflies supercharged by a bacterial infection:
<http://www.cbc.ca/quirks/episode/2011/06/25/june-25-2011/>

NY Times book review of the scandalous new book titled "Sex on Six Legs" by biologist Marlene Zuk:
http://www.nytimes.com/2011/09/04/books/review/sex-on-six-legs-by-marlene-zuk-book-review.html?_r=1

Audio podcast from CBC's 'Quirks and Quarks' about mate-guarding and chivalry of male field crickets:
<http://www.cbc.ca/quirks/episode/2011/10/22/october-22-2011/>

An article on the determination of the wing colours of a 47 million year old fossilized moth:
<http://www.sciencefriday.com/arts/2011/11/clues-to-color-preserved-in-fossilized-moth-wing-architecture/>

Audio podcast from CBC's 'Quirks and Quarks' about cooperation by male pollinator fig wasps to allow the females to escape the fig:
<http://www.cbc.ca/quirks/episode/2011/12/03/december-3-2011/>

Audio podcast on the loudest animal in the world for its size, the water boatman:
<http://www.scientificamerican.com/podcast/episode.cfm?id=tiny-insect-makes-biggest-noise-11-07-07>

Video podcast on teaching about insects in the classroom:
<http://www.talkingscience.org/2011/11/for-the-love-of-bugs/>

Columnist Pete Heule's entomological podcasts called 'Critters n' Bugs' have recently discussed ant-mimicking wasps and moths that resemble bird-droppings:
<http://www.cbc.ca/radioactive/columnists/bugs/>

A 'Science Daily' news story on mimicry in tropical caterpillars:
<http://www.sciencedaily.com/releases/2011/12/11216174442.htm>

The new Twitter feed for the ESBC:
<https://twitter.com/EntSocBC>

The new Facebook page for the ESBC:
<http://www.facebook.com/groups/135038946598013/>

Ribald Tales of Entomology Limerick Contest 1st Runner up:
<http://membracid.wordpress.com/2011/11/14/ribald-tales-of-entomology-limerick-contest-1st-runner-up/>



Calendar of events

DECEMBER 2011						
S	M	T	W	T	F	S
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

Dec. 10 – Beaty Biodiversity Museum’s “Surviving in a Winter Wonderland” program begins

JANUARY 2012						
S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

Jan. 8 – Beaty Biodiversity Museum’s “Way Cool Biodiversity” program begins

Jan. 11 to 14 – 23rd USDA Interagency Research Forum on Invasive Species, Annapolis, MD

Jan. 24 to 25 – Invasive Plant Council of British Columbia’s 2012 Public Forum - “Shutting Out Invaders”, Richmond, BC

FEBRUARY 2012						
S	M	T	W	T	F	S
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29			

Feb. 22 to 23 – The 14th Pacific Entomology Conference, Waikiki, HI

Feb. 27 – The deadline for submission of nominations for the various ESC Achievement Awards



Mar. 24 to 28 – The ESA Pacific Branch Meeting, Portland, OR

Mar. 27 to 29 – The 7th International Integrated Pest Management Symposium - "IPM on the World Stage—Solutions for Global Pest Challenges", Memphis, TN

MARCH 2012						
S	M	T	W	T	F	S
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

Apr. 1 to 4 – International Plant Resistance to Insects 20th Biennial Workshop Minneapolis, MN

APRIL 2012						
S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30					

May 15 – Submissions for the June edition of Boreus due

May 27 to 31 – The 3rd International Forum for Surveillance and Control of Mosquitoes and Mosquito-borne Diseases, Suzhou, Jiangsu, China

MAY 2012						
S	M	T	W	T	F	S
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		



Random Photographs



Spindle tree and Japanese Maple colours in a Burnaby garden, 2011. Insects not obvious but probably present. Photo Peter and Elspeth Belton.



Dead Chrysops? From an islet in the Broughton Archipelago June 30 2009. Probably *Chrysops excitans* and *Chrysops coloradensis*. Seemed to chant "Bite Belton! Bite Belton". Photo Peter and Elspeth Belton.



Random dragonflies. Photo Dezene Huber.



Cirque du Weevil - acrobatic weevils pose for effect. Photo Gayle Jespersion.



Random Bits of Information

Gypsy Moth BC Ministry of Forests, Lands and Natural Resource Operations website

<http://www.for.gov.bc.ca/hfp/gypsymoth/index.htm>

Caterpillars that can be mistaken for Gypsy Moth

<http://www.for.gov.bc.ca/hfp/gypsymoth/caterpillars.htm>

British Columbia Conservation Data Centre has assigned conservation status ranks to Orthoptera and related insects on B.C. Species and Ecosystems Explorer due to be posted by April 2012

<http://www.env.gov.bc.ca/atrisk/toolintro.html>

Additional Random Conferences and Entomological Events (from the Entomological Society of America website <http://www.entsoc.org/Periodicals/News/datebook>)

Conferences in 2012

An International Symposium on Pollinator Conservation will be held January 27-29, 2012 at Kyushu University in Fukuoka, Japan. Contact pollinatorconservationjp@gmail.com.

The Michigan Mosquito Control Association's 26th Annual Meeting will be held February 1-2, 2012 in Port Huron, MI. Contact Randy Knepper (989-755-5751) or randy@scmac.org.

The 14th Pacific Entomology Conference will be held on February 22 and 23, 2012 at the Outrigger Waikīkī in Hawaii. Contact Darcy Oishi at darcy@hawaiianentsoc.org.

The Second International Symposium of Bio-Pesticides and Eco-toxicological Network will be held March 1-3, 2012 in Bangkok, Thailand. Contact Dr. Vasakorn Bullangpoti at +66-25625555 ext. 3273 or fscivkb@ku.ac.th.

A Joint Meeting of the ESA Southeastern and Southwestern Branches will be held March 3-8, 2012 at the Peabody Hotel, Little Rock, Arkansas.

The ESA Eastern Branch Meeting will be held March 16-19, 2012 at the Hilton in Hartford, Connecticut.

A Mosquito Control Workshop will be held March 20-22, 2012 at Florida State University in Panama City, Florida. Contact John Smith at jsmith@pc.fsu.edu or (850) 770-2260.

The ESA Pacific Branch Meeting will be held March 24-28, 2012 at the Portland Waterfront Marriott in Portland, Oregon.

The 7th International IPM Symposium will be held in Memphis, Tennessee on March 27-29, 2012 at the Memphis Cook Convention Center. Contact: margaret.appleby@ontario.ca.

The 9th Arbovirus Surveillance and Mosquito Control Workshop will be held at AMCD, St. Augustine, Florida, March 27-29, 2012. Contact Dr. Rudy Xue at 904/471-3107 or visit www.amcdsjc.org.



International Plant Resistance to Insects 20th Biennial Workshop will be held April 1-4, 2012 in Minneapolis, Minnesota. Contact Lee French at (507) 752-7274 or lfrench@rrcnet.org.

The 1st Annual World Congress of Biodiversity-2012 (WCBD-2012) will be held April 25-28, 2012, in Xi'an, China.

The Second USA Science and Engineering Festival will be held April 28-29, 2012 in Washington, DC.

The 3rd International Forum for Surveillance and Control of Mosquitoes and Mosquito-borne Diseases will be held at Suzhou, Jiangsu, China, May 27-31, 2013. Contact Dr. Rudy Xue at xueamcd@yahoo.com and Dr. Tongyan Zhao at aedes@263.net

The ESA North Central Branch Meeting will be held June 3-6, 2012 at the Embassy Suites in Lincoln, Nebraska.

The Combined 2012 Annual Meeting of the Lepidopterists' Society and the Societas Europaea Lepidopterologica will be held July 23-29, 2012 at the Denver Museum of Nature & Science. Contact Todd Gilligan at tjilliga@gmail.com.

National Moth Week will be held July 23-29, 2012. National Moth Week is a celebration of moths and biodiversity and is looking for participants to hold Moth Night events across the country that week. Contact Liti@nationalmothweek.org or Dave@nationalmothweek.org.

A Bean Beetle Curriculum Development Workshop will be held at Emory University, Atlanta, GA July 25-27, 2012. Contact Christopher Beck (Emory University) christopher.beck@emory.edu and Lawrence Blumer (Morehouse College) lblumer@morehouse.edu.

The International Congress of Entomology will be held August 19-25, 2012 in Daegu, South Korea.

Entomology 2012, the 60th Annual Meeting of the Entomological Society of America, will be held November 11-14, 2012 in Knoxville, Tennessee.

The International Conference on Advances in Plant Sciences will be held from November 14-18, 2012 at the Empress Hotel in Chiang Mai, Thailand.

2013

The ESA Southeastern Branch Meeting will be held March 2-7, 2013 at the Baton Rouge Hilton in Baton Rouge, Louisiana.

The 4th International Symposium on Biological Control of Arthropods will take place in Pucón, Chile, March 4-8, 2013. Contact Tania Zaviezo at tzaviezo@uc.cl.

The ESA Pacific Branch Meeting will be held April 6-11, 2013 at Harrah's Lake Tahoe in Stateline, Nevada.

Entomology 2013, the 61st Annual Meeting of the Entomological Society of America, will be held November 17-20, 2013 in Austin, Texas.

2014



The XVII Congress for the International Union for the Study of Social Insects will be held July 13-18, 2014 in Cairns, Australia. Contact info@iussi2014.com.

Random Fairy Sighting?



Or lightening bug? Photo taken at a small lake near Port Renfrew on Vancouver Island. What do you think this is? Send your responses to EditorBoreus@gmail.com. Photo by Trudy Chatwin, Summer 2011.



Awards and Prizes

The deadline for submission of nominations for the various Entomological Society of Canada Achievement Awards is fast approaching: **27 February, 2012**. So, wait no longer to nominate a colleague for one of the following awards:

- Gold Medal Award
- C. Gordon Hewitt Award
- Fellow of the ESC
- Honorary Member of the ESC

In addition, we seek applications for the Bert and John Carr Award.

Award descriptions and procedures for nominations are available on the ESC website:

<http://www.esc-sec.ca/awardnominations.html>

Nominations and applications must be sent to the Chair of the Achievement Awards Committee, Rose De Clerck-Floate, on or before 27 February 2012, at Rosemarie.DeClerck-Floate@agr.gc.ca.

Random Photos from the Field Afar



Rudi Verspoor desperately seeking web-building spiders (and a trail...) in the high Andes of Ecuador, Summer 2011. Photo Maxence Salomon.



Delightful inhabitant of the lowland rainforest of Ecuador, 2011. Photo Maxence Salomon.



Bathrooms in the rainforest of Ecuador are prime field sites for conducting insect diversity surveys, 2011. Photo Maxence Salomon.



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Coccinellid larvae, Victoria area. Photo Jennifer Heron.



Suzanne Acheampong labeling a spotted wing *Drosophila* trap in Kelowna. Photo by Gayle Jespersen.



Female praying mantis, *Mantis religiosa*, on a lodgepole pine tree at the Kalamalka Seed Orchards in Vernon BC. Summer 2011. Photograph Judy Thomson.