

Minutes for 2014 Drosophila Board Meeting – Prepared by Ken Irvine

Minutes of the 2014 Fly Board Meeting

The 2014 National Drosophila Board Meeting took place on Wednesday March 26 in the Pacific Ballroom Salon 1 of the Town & Country Hotel, San Diego, CA, from 3:00 to 6:00 PM.

Attendees: Amy Bejsovec, Ken Irvine, Ela Serpe, Suzy Brown, Debbie Andrew, Adam Fagen, Lynn Cooley, Helen Salz, David Bilder, Mike O'Connor, Kathy Matthews, Kevin Cook, Toshi Takano-Shimizu, Maxi Richmond, Teri Markow, Sue Celniker, Hugo Bellen, Stephanie Mohr, Liz Perkins, Lisa Meadows, Allan Spradling, Jim Thompson, Bill Gelbart, Daniel St Johnston, Greg Beitel, Thom Kaufman, Seth Blair, Andrea Page-McCaw, Sarah Certel, Steve Crews, Elissa Lei, Scott Barolo, Mike Galko, Brian Oliver, Helen Salz, Laura Nilson, Angela Stathopoulos, Gary Hime, Alexis Nagengast, Mark van Doren, Mariana Melani, Jessica Treisman

Agenda

1. Introduction (Amy Bejsovec) 3:00-3:05
2. 2014 Report of the Organizing Committee (Ela Serpe) 3:05-3:15
3. 2015 Fly Meeting Organizers (Amy Bejsovec) read only
4. Drosophila Board Election Report (Amy Bejsovec for Liz Gavis) 3:15-3:20
5. Report of the GSA Senior Director (Suzy Brown) 3:20-3:30
6. Treasurer's Report (Debbie Andrew) 3:30-3:45
7. GSA Expanding Opportunities (Adam Fagen) 3:45-3:55
8. Proposal for FlyBook (Lynn Cooley) 3:55-4:05
9. Victoria Finnerty Undergraduate Travel Award (Helen Salz) 4:05-4:15
10. Image Award (David Bilder) 4:15-4:20
11. Sandler Lectureship Committee (Amy Bejsovec for Marc Freeman) 4:20-4:25
12. President's Report – Sandler award issues (Amy Bejsovec) 4:25-4:35
13. Public Outreach (Amy Bejsovec for Liz Gavis, Eric Baehrecke) 4:35-4:45
- BREAK 4:45 -5:00

Community Resources and Projects 5:00-6:00

14. White Paper – discussion of timing (Mike O'Connor)
15. Bloomington Stock Center (Kathy Matthews, Kevin Cook)
16. Kyoto Stock Center (Toshi Takano-Shimizu)
17. Species Stock Center (Maxi Richmond, Teri Markow)
18. Berkeley Drosophila Genome Project (Sue Celniker)
19. ModENCODE and ModENCODE II (Sue Celniker)
20. Drosophila Gene Disruption Project (Hugo Bellen)
21. Harvard Drosophila RNAi Screening Center (Stephanie Mohr)
22. Harvard Transgenic RNAi Project (Liz Perkins)
23. Vienna Drosophila RNAi/Resource Center (Lisa Meadows)
24. DIS (Jim Thompson)
25. FlyBase (Bill Gelbart)

Discussion items are italicized, are not necessarily direct quotes, and the discussion was compressed and paraphrased. Where similar or related comments were made by multiple individuals, they are attributed to "Floor"

1. Introductions and Welcome (Amy Bejsovec)

2. 2014 Report of the Meeting Organizing Committee (Ela Serpe, Mark Van Doren, Elissa Lei, Daniele Drummond-Barbosa)

Ela: The organizers received valuable help from past organizers and from Suzy Brown. The organizers were all from the same geographical area but this was not in the end essential as meetings were conducted remotely. Speakers were chosen based on excellence and reflecting diversity of topics, location, gender, and career stage. For the keynote speech the organizers selected Bruce Alberts, with the idea that he could provide not only a historical perspective but also a vision of the future and of science policy. Changes to organization of the meeting included revising keywords for abstract submissions, and adjusting the organization of platform talks in different areas to reflect changing interest of the *Drosophila* community attending the meeting. Areas of increased interest included evolution & quantitative genetics, and *Drosophila* as a model for human disease. In addition, two platform sessions were initially left open to allow for extra talks among popular topics. This enabled a better distribution of talks among sessions but was extra work for the organizers. The abstract deadline was also pushed later (to Dec 9th) to encourage submission of abstracts reflecting the most current studies. In addition to selecting talks and chairing sessions, the session chairs are also responsible for judging posters; extra help was recruited where needed for this. The number of workshops keeps increasing, and the organizers rejected one that overlapped with a platform session.

Mark: The selection of subject areas for abstract submissions is a poll of community interests and research trends, it could be useful to keep track of this data over time. Long term tracking would require standardization of key words, which currently can change form year to year.

Suzy: The GSA could keep track of this data; the cost would not be significant and could be absorbed by GSA.

Mark: The chances of an abstract being selected for a talk depend not only on the perceived quality of the research, but also on the size of the session selected for presentation, which is an arbitrary way to select. Revising the list of topic selected so that there are fewer larger sessions could reduce the variability in chances of selection.

Floor: Standardizing keywords so that research interests can be tracked could help future organizers and seems like a good idea. Reducing the number of areas for abstract submission could make organizing the meeting more complicated. The 2015 organizers are encouraged to consider the suggestions of the organizers of this years meeting and then decide how to proceed.

3. Future Fly Meeting Organizers (Amy Bejsovec)

Organizers of the 2015 Fly Meeting will be Greg Beitel, Ilaria Rebay, Michael Eisen and TBD

Organizers of the 2016 Fly Meeting will be Sue Celniker, Nancy Bonini, Dave Bilder, Ross Cagan

4. Drosophila Board Election Report (Amy Bejsovec for Liz Gavis)

The election was held earlier (Oct 15 – Dec 6) to give winning candidates more time to make plans to attend the board meeting. Also, the candidates were asked to provide biographical sketches rather than just a link to their web page. Both of these changes worked well.

It was difficult to identify candidates for the Northwest region due to the relatively small number of *Drosophila* labs. Two possible reorganizations were discussed, either moving Northern California from California to Northwest, or moving Utah (from Heartland) and Nevada (from California) to the Northwest. After discussion the board voted to move Utah and Nevada to the Northwest region, the vote was unanimous (20-0).

New Representatives elected for 2014:

Northwest: Sarah Certel

Southeast: Andrea Page-McCaw

Heartland: Michael Galko

Great Lakes: Scott Barolo

President elect: Dave Bilder

5. Report of the GSA Senior Director (Suzy Brown)

It is currently anticipated that we will lose money at this year's meeting (approximately \$15,000) due to lower attendance. GSA is promoting the 2015 and 2016 meetings; increased attendance should help finances. A reporter is present at this meeting filming and conducting interviews that will be used for PR. Feedback on the 2016 Genetics conference so far has been very positive. Each group will have its own designated space at the 2016 meeting.

Sites for future *Drosophila* conferences are currently booked through 2018, we need to book the 2019 and 2020 sites soon. 2019 is scheduled to be a mid-west meeting, but Chicago is always an expensive location in part due to high union fees, we should consider alternatives.

Floor: After some discussion, a consensus plan was agreed on:

2019 Meeting will be at a midwest site. Suzy will investigate and provide data to the board on multiple options, including Indianapolis, Chicago, and Dallas. After reviewing this information on the sites and anticipated costs, the board will vote by email on the 2019 site. For 2020 Meeting we will plan to return to the Town & Country in San Diego.

6. Treasurer's Report (Debbie Andrew)

We broke even at last year's meeting in DC, but expect to lose money this year. We had a balance after last year's meeting of ~\$247,000, we are required (by a 2003 decision of GSA board) to maintain at least one half of anticipated meeting expenses as a reserve. We are OK for now, but may need to increase meeting registration fees slightly, especially as we return to Chicago next year. The Sandler fund is in good shape due to the transfer of \$20,000 to this account by the board last year.

Suzy: We all want the meeting to be as affordable as possible, especially to make it possible for trainees to attend. We would like to budget on a break-even basis, ie not to either dig into or build up the current reserves. A slight increase in registration fees is insignificant compared to other costs (airfare, hotel, meals), but at this point we are not sure if it will be necessary.

Debbie: Move to let Suzy decide if a modest increase in fees (Cost-of-living increase) is needed for next year's meeting based on future estimates of the anticipated cost.

Board: Vote was unanimous (20-0) in favor of the motion.

7. GSA Expanding Opportunities (Adam Fagen)

The GSA is glad to continue its partnership with the *Drosophila* community, organizing this meeting together for the 25th time. We are looking forward to the 2016 joint GSA meetings (The Allied Genetics 2016 Conference), which will include a small number of joint sessions, determined by a coordinating committee of the scientific organizers. The meeting will include *C elegans*, Ciliate, *Drosophila*, Mouse, Yeast, Zebrafish, and Population, Evolutionary and Quantitative Genetics.

GSA is supporting community education and career development. We have a new communications and engagement manager, to help spread the word about genetics research. The GSA is engaged in strategic planning, and will be asking for help in emphasizing the importance of community resources like stock centers.

To expand career development workshop opportunities, sessions this year at the fly meeting are occurring today, before the formal start of the meeting. GSA has set up a new jobs board as a resource for the community, Geneticcareers.org, that is free to search and free to post jobs on.

The GSA submitted testimony to congress regarding travel regulations for federal employees, which have made it harder for federal employees to attend meetings.

On Friday evening a filmmaker will present a preview of part of his film entitled "The fly room", based on Calvin Bridges. The GSA helped to sponsor this film on a pioneer of *Drosophila* genetics.

8. Proposal for FlyBook (Lynn Cooley)

The idea of publishing "Flybook" was first discussed 2008, as an online resource of *Drosophila* reviews and techniques similar to the Wormbook published by the *C elegans* community. The possibility of publishing it as a Cold Spring Harbor Book was considered, but they couldn't provide a financial model that made sense, and one of the original promoters of the project (Michale Ashburner) was unable to continue due to health reasons, so the project was put aside. In 2011 the GSA and the journal *Genetics* began publishing Yeastbook, which provides comprehensive reviews and state of the

art information on Yeast as an experimental system from experts in the field. They have so far published 35 chapters, and it's become an important resource for new trainees and has increased traffic to the *Genetics* web site. GSA and Genetics now propose to publish a Flybook, which is envisioned as providing easy access to definitive reviews, and to be a go-to place for trainees, scientists new to *Drosophila*, or scientists transitioning to a new system. A planning committee, including Lynn Cooley, Teri Markow, Scott Hawley, and Allan Spradling, has begun to draft sections, identify section editors, and propose chapters. Publication of 50-60 chapters over a 3-5 year period is envisioned. They are here to generate enthusiasm and request funding. Genetics and GSA provided all funding for Yeastbook, but say they can't afford the full costs for Flybook, so the *Drosophila* community would need to contribute to make it happen. Cost for the project is estimated at ~\$150,000. Is the board interested in contributing?

Floor: Questions were raised regarding the cost, the scope of the chapters, the anticipated shelf life of the chapters, and whether it is really a worthwhile investment considering that reviews might be published in other forums at no cost to the fly board.

Adam: It cost money to publish even an online only article. The cost per article is based on and similar to publication costs for any Genetics paper. It's estimated that GSA could put in \$40-50,000, the remainder would have to come from other sources.

Lynn: It's envisioned as a comprehensive set of reviews, all accessible in one place, that would provide fundamental background for anyone getting started, and in a more accessible and coordinated fashion than randomly collected reviews. A possible way to raise money could be a surcharge on the meeting registration fees for the next few years. We would welcome other ideas or suggestions for raising the money.

Summary: There was agreement that this could be a useful resource for the community but no decision was reached on whether or not it is something the board should be contributing to financially.

9. Victoria Finnerty Undergraduate Travel Award (Helen Salz)

Michael Finnerty, son of Victoria Finnerty, gave money a few years ago to support an Undergraduate Travel Award in her memory. Each year the number and quality of applicants increases, the original funds donated were completely spent out and replenished by the fly board. This year there were 52 applicants, 11 awards were made, at a cost of \$9000. Need more funds to keep it going.

Hugo: This needs to be set up with an endowment mechanism, similar to the Sandler award, or it will not last.

Amy: GSA has travel awards for other societies, can they contribute?

*Adam: The amounts are very small, only 5 undergraduate travel awards were made across all of the non-*Drosophila* GSA conferences.*

Floor: Potential mechanisms for fundraising were discussed, including donations from PIs, and putting a checkbox on the meeting registration form for donations. If money was accumulated in an account, the GSA Director of Finance could invest it.

Debbie: Move to transfer \$6000 to the Victoria Finnerty Travel Award for next year, with instructions to not spend all of it, so that we can start to accumulate a surplus for an endowment to maintain the Award. The exact amount to be saved was not specified.

The motion passed unanimously (20-0)

10. Image Award (David Bilder)

There was a large group of outstanding entries, comprising 60 total submissions, including 13 videos. A winner and a runner-up were selected in each category, David will present the awards at the meeting. In addition the Image Award Committee granted a Special Commendation to Andreas Prokop for images in his “Rough guide to *Drosophila* mating schemes” because of their outstanding value in training *Drosophilists*.

11. Sandler Lectureship Committee (Amy Bejsovec for Marc Freeman)

The Sandler award committee comprised Marc Freeman (Chair), Erika Bach, Mike Buszczak, Harmit Malik, and Sarah Cherry. 23 nominations were received, including ~ equally numbers of male and female nominees. The winner is Ruei-Jiun Hung, from Jonathan Terman’s laboratory at UT Southwestern; Runners-up are Katherine Kohl and Johannes Kohl. The Chair of next year’s Sandler Committee will be Erika Bach.

12. President’s Report – Sandler award issues (Amy Bejsovec)

Amy has investigated the longstanding gender imbalance among Sandler awardees (since inception of the award, 21 male winners, 6 female). Although the trend over the last few years is encouraging (2 male & 2 female in last 4 years) she has recommendations based on other studies (eg investigation into the gender imbalance among the first NIH Pioneer Award winners) to reduce or eliminate gender bias. Not accusing anyone of explicit bias, but need to be on guard against unconscious bias, not only among Award Committee members, but also in considering letters of recommendation (most winners have been nominated by male PIs). Two main recommendations:

1) Ask the selection committee to keep track of gender information, including genders of all the students nominated and their faculty nominators.

2) Ask the selection committee read a committee report that discusses possible sources of gender bias, so that they can be more aware of the potential for unconscious bias:

Carnes M, Geller S, Fine E, Sheridan J, and Handelsman J. NIH Director's Pioneer Awards: could the selection process be biased against women? *J Womens Health (Larchmt)*. 2005 Oct;14(8):684-91. Review. PMID:16232100.

<http://online.liebertpub.com/doi/pdf/10.1089/jwh.2005.14.684>

Amy briefly reviewed 6 factors identified in this report as potentially contributing to gender bias.

Floor: There was agreement that this is a concern, and increasing awareness of gender bias could help. There was some discussion as to whether other changes should be made (eg collecting more letters of recommendation, having the committee all from the same place so they could meet in person) but no decisions on additional changes were reached.

Ken: Move to accept Amy’s two recommendations to the Sandler Award Committee. The motion passed unanimously (20-0).

13. Public Outreach (Amy Bejsovec for Liz Gavis, Eric Baehrecke)

Last year Eric Baehrecke and Yuly Fuentes discussed some ideas for enhancing advocacy of fundamental research. No clear recommendations emerged from this discussion and no funds were committed. Eric and Yuly have been continuing their efforts at UMASS.

Floor: Agree that outreach that publicizes and emphasizes the importance of fundamental research is important, but how to do it and how to pay for it? Simple ideas could include a web site dedicated to highlighting discoveries coming from Drosophila research.

14. White Paper – discussion of timing and content (Amy Bejsovec and Mike O'Connor)

Amy: Historically, a new white paper was done every 2 years. The white paper is important for people requesting funding for community resources. There was reportedly some feedback from NIH that it doesn't change enough. But our priorities don't necessarily change every two years, the community has long term goals. What does GSA do?

Adam: The GSA has a white paper that is sufficiently generic (no specific organisms get mentioned) that others could build on it.

Ken: In my recent discussions with NIH program officers, they didn't seem that concerned with the timing, the comment was that the timing of when a new White Paper is needed and what's in it should be driven by the science. The White Paper is viewed as useful at NIH as an objective document that reviewers can look at when evaluating grants to see whether they are addressing stated needs and goals of the community.

Bill: Suggest that in preparing the next White Paper, get input from the community at the beginning of the process, e.g. via a survey as Flybase has done, rather than just asking for comment at the end.

Floor: A survey is a good idea. Could also mine databases, eg Pubmed Central to identify active areas of research and funding.

Mike: Need to consider what the purpose is – who is it for, what should its content be, what could we do to make it more influential.

Sue: Could try to publish it somewhere as a commentary; right now it seems to be losing its impact.

Hugo: For resource grants, letters from the community are very important, but the White Paper is important too.

Allan: In discussions with NIH, need to think about and be able to provide estimated costs of specific projects.

Mike: Solicited ideas for the last White Paper but the response rate was low, and some just emphasized their own projects.

Floor: Consensus that survey is a good way to start preparing for the next White Paper, asking the right questions will be important. No decision was made on the timing.

15. Bloomington Stock Center (Kathy Matthews, Kevin Cook)

BSC now has over 50,000 stocks, and continues to grow. NSF will no longer be able to provide funding after the current grant expires. NIH is supportive and will fund as much as they can; an NIH grant is currently being reviewed. However, the majority of support now comes from user fees, which have risen substantially over recent years. BSC is now more self-sufficient because of this, and it is hoped that further increases will not be needed, but this will depend on the level of outside funding received.

16. Kyoto Stock Center (Toshi Takano-Shimizu)

2014 is financially a tough year, as funding is being decreased by 10%. Consequently there will be some increase in costs for stocks, details are available on the web site.

17. Species Stock Center (Maxi Richmond, Teri Markow)

A grant from NSF was renewed, but the budget was cut. The fraction of costs covered by grants will decrease from 73% to 62%. To compensate for this efforts are being made to increase the user base, including enhancing the amount and clarity of information available on the web site, and working with labs on special projects. User fees will also have to increase.

18. Berkeley Drosophila Genome Project (Sue Celniker)

The BDGP continues efforts to improve the accuracy and annotation of the Drosophila genome. One aspect of this is enhancing clone resources. New collections of clones are being prepared that will maximize utility and facilitate expression studies. Attempts to continue funding for the BDGP in situ project are being made, a grant will have to be resubmitted.

19. ModENCODE and ModENCODE II (Sue Celniker)

The modENCODE project has formally ended, but papers are still being completed. It is anticipated that a series of papers will be published soon. All of the data generated by modENCODE will be available on a website.

20. Drosophila Gene Disruption Project (Hugo Bellen)

Details of the GDP progress, plans and goals are outlined in the report for the agenda. Over 12,000 MiMIC insertions have been created, and GFP has been inserted in 500 of them. A new grant has been submitted, proposing to use CRSPER/CAS technology to insert a modified MiMIC vector at specific locations instead of relying on random insertion. This should enable targeting of virtually all loci with a versatile element that can be used for a variety of mutagenesis or tagging approaches.

21. Harvard Drosophila RNAi Screening Center (Stephanie Mohr)

More and more screening is being done off site, the DSRC can provide reagents for

labs and facilities interested in establishing this capability. Continue to incorporate new technologies, and to update bioinformatics resources.

22. Harvard Transgenic RNAi Project (Liz Perkins)

TRiP is also enhancing bioinformatics resources. The RSVP database provides community feedback on RNAi lines, and TRiP continues to accept nominations for specific genes to be targeted.

23. Vienna Drosophila RNAi/Resource Center (Lisa Meadows)

VDRC is in the 4th year of a 5 year funding period, it is anticipated that funding will be reduced in the future, which will have to be made up by increased user fees. Currently, about 50% of costs are recovered from user fees, the remainder comes from local funding. Redundancy within the collection will be reduced to save costs.

24. DIS (Jim Thompson)

Volume 96 of DIS was just published. This issue was 25% larger than usual, due to increased submissions. Some articles are now being pre-published electronically.

25. FlyBase (Bill Gelbart)

BDGP and NCBI are finalizing release 6 of the *Drosophila* genome. This changes genomic coordinates, and the release is being done slowly, carefully, and in coordination with NCBI. The release includes 7 – 10 MB of new genomic sequence, including significantly improved sequence for heterochromatin. The full release will take 7-8 months, and will include curation of models of human disease genes in *Drosophila*.

Kathy Mathews, a founding PI of Flybase, is stepping down, and we thank her for many years of outstanding service to Flybase.

A competitive renewal for funding received an excellent scientific review and the funding level is currently being negotiated with NHGRI. NHGRI has funded Flybase continuously since 1992, but may need to reduce funding to support other projects. Can other NIH institutes help share the funding load? Also thinking more generally about funding and cost recovery – most funding comes from NHGRI. User metrics show 40% of use is US, but 28% is European, 32% is rest of the world (mainly asia). These other users will need to contribute, but best mechanism for achieving this is unclear.