COMMITTEE ON NEUROSCIENCE DEPARTMENTS AND PROGRAMS

THURSDAY, MARCH 29, 2012

&

SATURDAY, MARCH 31, 2012

SFN HEADQUARTERS
1121 14TH STREET NW
SUITE 1010
WASHINGTON D.C.

(To assist with navigation, open the "bookmarks" feature from the menu on the left hand side of your Acrobat view)

A G E N D A

Thursday, March 29, 2012

8:00am   **Breakfast available**

8:30 – 8:40   **Welcome, Overview of Agenda, and Expected Outcomes**
- CNDP Member Update
    - CNDP Member Roster – Exhibit 1
    - CNDP Member Profiles – Exhibit 2
- Approval of Minutes from 2011 Fall CNDP Meeting
    - Fall 2011 CNDP Meeting Minutes – Exhibit 3
- Approval of IP Applications
    - Cornell University Neurobiology and Behavior (Undergraduate) – Exhibit 4
    - University of Georgia Interdisciplinary Neuroscience Program (Graduate) – Exhibit 5
    - University of Puerto Rico, Anatomy and Neurobiology Program (Graduate) – Exhibit 6

8:40 – 9:00   **NDP Conference Update & Lunchtime Discussion Plan**
    - 2012 NDP Spring Conference Agenda – Exhibit 7
    - 2012 Conference Registrants – Exhibit 8

9:00 – 9:45   **SfN Strategic Opportunities & Membership Enhancement Plan Working Group Update**
Eun-Joo Chang, SfN Senior Director for Membership and Professional Development

9:45 – 10:00   **Break**

10:00 – 10:15   **CNDP Three-year Strategic Plan Introduction**
    - SfN Higher Education and Training Strategy – Exhibit 9
    - CNDP Charter – Exhibit 10
    - CNDP Higher Education and Training Strategic Plan Priorities: March 2011 Update – Exhibit 11
    - SfN Budget Planning Cycle – Exhibit 12
    - Professional Development Strategic Plan (2010-2014) – Exhibit 13
    - Professional Development Strategic Plan 2011 Implementation Status Chart – Exhibit 14

10:15 – 10:30   **Update from the Professional Development Committee (PDC)**
Julio Ramirez, CNDP Liaison to the PDC

10:30 – 12:00   **CNDP Strategic Plan Area #1 – IP Membership Benefits & Member Communications**
- **Recruitment & Retention of New IP Members**
  Barry Black, SfN Director of Membership & Marketing
      2012 IP Members – Exhibit 15
- Communications and promotion of IP membership
      List of IP Member Benefits – Exhibit 16
      IP Newsletter – Exhibit 17
- Student recruitment for IP members
      IP Directory – Exhibit 18
      IP Directory Individual Profile – Exhibit 19
- Annual meeting activities
      2011 NDP-related Annual Meeting Activities – Exhibit 20
      2012 NDP Grad Fair Registration Form (draft) – Exhibit 21
      SfN Travel Award Programs – Exhibit 22
- Collaborations
  - Faculty for Undergraduate Neuroscience (FUN)
  - Association of Medical School Neuroscience Department Chairs (AMSNDC)

12:00   **Working Lunch**

12:15 – 1:30   **CNDP Strategic Plan Area #2 – Networking and Professional Development for Department Chairs & Program Directors**
- Spring conference
      2011 Post-conference IP Member Survey – Exhibit 23

1:30 – 2:45   **CNDP Strategic Plan Area #3 – Information Resources & Research**
- Biennial NDP Survey
- Resources on SfN Web site
      NDP Web page on SfN.org – Exhibit 24
      IP Membership Web page on SfN.org – Exhibit 25
- Educational Resources in Neuroscience (ERIN)
- IP Member Information Needs
      2012 Graduate Student Survey (preliminary results) – Exhibit 26
      "Survival Analysis of Faculty Retention in Science and Engineering by Gender" (article by Deborah Kaminski, et al., in *Science*) – Exhibit 27

2:45 – 3:30   **CNDP Strategic Plan Area #4 – Advocacy**

3:30 – 5:30   **Prioritization and Next Steps**
- Identification of priorities from previous discussions
- Implementation timeline
- CNDP subcommittee structure and assignments

6:30pm   **Dinner at Ceiba**
701 14th Street, NW, Washington, DC, (202-393-3983)

Saturday, March 31, 2012

7:30am   **Breakfast**

8:00 – 10:00   **Conference debriefing and reporting out of lunchtime discussions**

10:00 – 11:00   **Planning for 2013 workshop**

11:00 – 11:20   **Nominations for 2011 Award for Education in Neuroscience**

11:20 – 12:00   **Wrap-up and next steps**
- Recap of CNDP strategic priorities for 2013
- Information-sharing with IP Members

12:00   **Box lunch provided**

SfN Committee on Neuroscience Departments and Programs (Spring 2012)			
David R. Riddle, PhD - *Chair* (336) 716-4677 driddle@wfubmc.edu	2012	Wake Forest University School of Medicine Winston Salem, NC	Graduate
Hermes H. Yeh, PhD *Incoming Chair* (603) 650-7798 hermes.yeh@dartmouth.edu	2015	Dartmouth Medical School Lebanon, NH	Graduate
Clivel G. Charlton, PhD (615) 327-6510 ccharlton@mmc.edu	2014	Meharry Medical College Neurobiology & Neurotoxicology Nashville, TN	Graduate
Barry W. Connors, PhD (401) 863-2982 bc@brown.edu	2013	Brown University Department of Neuroscience Providence, RI	Undergraduate
Jean C. Hardwick, PhD (607) 274-3213 jhardwick@ithica.edu	2014	Ithica College Ithica, NY	Undergraduate
Kristen A. Keefe, PhD (801) 585-7989 k.keefe@utah.edu	2014	University of Utah Department of Pharmacology Salt Lake City, UT	Graduate
Michael S. Levine, PhD (310) 825-7595 mlevine@mednet.ucla.edu	2013	University of California at Los Angeles Mental Retardation Research Center Los Angeles, CA	Graduate
Irwin B. Levitan, PhD *AMSNDC Liaison* (215) 503-5996 irwin.levitan@jefferson.edu	2012	Thomas Jefferson University Department of Neuroscience Philadelphia, PA	Post Doc
Barbara Lom, PhD (704) 894-2338 balom@davidson.edu	2014	Davidson College Biology Department and Program in Neuroscience Davidson, NC	Undergrad
David A. Morilak, PhD (210) 567-4174 morilak@uthscsa.edu	2012	University of Texas Health Science Center Dept of Pharmacology & Ctr for Biomedical Neuroscience San Antonio, TX	Graduate
Ramesh Raghupathi, PhD (215) 991-8405 rramesh@drexelmed.edu	2012	Drexel University College of Medicine Philadelphia, PA	Graduate
Julio J. Ramirez, PhD *PDC Liaison* (704) 894-2888 juramirez@davidson.edu	2014	Davidson College Department of Psychology, Neuroscience Program Davidson, NC	Undergraduate
Cheryl L. Sisk, PhD (517) 355-5253 sisk@msu.edu	2014	Michigan State University Psychology & Neuroscience Program East Lansing, MI	Graduate
William D. Snider, MD (919) 843-8623 william_snider@unc.edu	2013	University of North Carolina School of Medicine UNC Neuroscience Center Chapel Hill, NC	Graduate
Eric P. Wiertelak, PhD *FUN Liaison* (651) 696-6111 wiertelak@macalester.edu	2014	Macalester College Neuroscience Studies Saint Paul, MN	Undergraduate
Konrad E. Zinsmaier, PhD (520) 626-1343 kez4@email.arizona.edu	2013	University of Arizona Department of Neuroscience Tuscon, AZ	Graduate

2012 Committee on Neuroscience Departments and Programs (CNDP)

David R. Riddle, PhD (Chair)
Professional Appointment: Associate Professor, Department of Neurobiology and Anatomy, Wake Forest University School of Medicine; member, Sticht Center on Aging and Brain Tumor Center of Excellence, Wake Forest University School of Medicine
Research Interests: Brain aging and radiation-induced brain injury
CNDP Term of Service: 2009-2012

Hermes H. Yeh, PhD (Incoming Chair)
Professional Appointment: Chair and Professor, Department of Physiology, Dartmouth Medical School; Chair, DBD study section, CSR
Research Interests: Developmental neurobiology; synaptic plasticity in development, aging and under conditions of chronic alcohol consumption
CNDP Term of Service: 2009-2012

Clivel G. Charlton, PhD
Professional Appointment: Professor of Neuroscience and Pharmacology, Chairman, Department of Neurobiology and Neurotoxicology, Meharry Medical College
Research Interests: Parkinson's disease
CNDP Term of Service: 2011-2014

Barry W. Connors, PhD
Professional Appointment: Professor and Chair, Department of Neuroscience, Brown University
Research Interests: Cellular physiology of the mammalian brain; mechanisms of epileptic seizures
CNDP Term of Service: 2010-2013

Jean C. Hardwick, PhD
Professional Appointment: Professor, Department of Biology, Neuroscience Coordinator, Department of Biology, Ithaca College
Research Interests: Cellular neurophysiology; modulation of cardiac autonomic neurons
CNDP Term of Service: 2011-2014

2012 Committee on Neuroscience Departments and Programs (CNDP)

Kristen A. Keefe, PhD
Professional Appointment: Professor, Department of Pharmacology and Toxicology; Director, Interdepartmental Graduate Program in Neuroscience, University of Utah
Research Interests: Functional neuroanatomy of the basal ganglia, drug abuse and addiction, Parkinson's disease
CNDP Term of Service: 2011-2014

Michael S. Levine, PhD
Professional Appointment: Professor, Psychiatry and Biobehavioral Sciences; Chair, Interdepartmental PhD Program in Neuroscience; Assoc. Dir., Education of the Brain Research Institute; Assoc. Dir., Intellectual and Developmental Disabilities Research Center, The David Geffen School of Medicine, University of California at Los Angeles
Research Interests: Cellular physiological mechanisms in neurodegenerative and developmental disorders and diseases
CNDP Term of Service: 2010-2013

Barbara Lom, PhD
Professional Appointment: Associate Professor & Chair of Biology, Biology Department and Program in Neuroscience, Davidson College
Research Interests: Developmental Biology
CNDP Term of Service: 2011-2014

David A. Morilak, PhD
Professional Appointment: Professor, Department of Psychiatry, University of Texas Health Science Center, San Antonio; Interim Director, Center for Biomedical Neuroscience, University of Texas Health Science Center
Research Interests: Stress neurobiology; brain monoaminergic modulatory function; antidepressant drug mechanisms of action; mechanisms of chronic stress effects on mood and cognition; HPA regulation
CNDP Term of Service: 2009-2012

Ramesh Raghupathi, PhD
Professional Appointment: Associate Professor, Department of Neurobiology and Anatomy, Drexel University College of Medicine
Research Interests: Developmental and adult drain injury; cell death; plasticity
CNDP Term of Service: 2009-2012

2012 Committee on Neuroscience Departments and Programs (CNDP)

Cheryl L. Sisk, PhD
Professional Appointment: Professor, Department of Psychology, Neuroscience Program, Michigan State University, Psychology and Neuroscience Program, Michigan State University
Research Interests: Brain and behavioral development during puberty and adolescence, hormonal influences on the developing brain and behavior
CNDP Term of Service: 2011-2014

William D. Snider, MD
Professional Appointment: Director, University of North Carolina Neuroscience Center; Professor, Department of Cell and Molecular Physiology
Research Interests: Neuronal growth factors in the development and regeneration of axons
CNDP Term of Service: 2010-2013

Konrad E. Zinsmaier, PhD
Professional Appointment: Professor of Neuroscience and Molecular & Cellular Biology, University of Arizona
Research Interests: Molecular mechanisms of synaptic function
CNDP Term of Service: 2010-2013

Irwin B. Levitan, PhD (Ex-officio)
Professional Appointment: Paul C. Brucker Professor and Chair, Department of Neuroscience & Director, Farber Institute for Neurosciences, Thomas Jefferson University
Research Interests: Long term regulation of neuronal excitability and synaptic transmission
CNDP Term of Service: 2009 – 2012

2012 Committee on Neuroscience Departments and Programs (CNDP)

Committee on Neuroscience Departments and Programs Liaisons

Julio J. Ramirez, PhD
Professional Development Committee Liaison
Professional Appointment: R. Stuart Dickson Professor, Department of Psychology; Director, `Neuroscience Program, Davidson College
Research Interests: Neurobiological basis of learning and memory, hippocampal plasticity, and recovery of function after brain damage
CNDP Term of Service: 2012-2014

Eric P Wiertelak, PhD
Faculty for Undergraduate Neuroscience Liaison
Professional Appointment: DeWitt Wallace Professor of Psychology, Director of Neuroscience Studies, Macalester College
Research Interests: Basic mechanisms of pain modulation, investigations of the impact of traditional medicines in animal models of pain, and motor systems neuroscience, using dance (ballroom, primarily) as a model
CNDP Term of Service: 2012-2014

Members Present

David Riddle, Chair	David Morilak
Hermes Yeh, Incoming Chair	Ramesh Raghupathi
Albert Berrebi	Virginia Seybold
Clivel Charlton	Cheryl Sisk
Barry Connors	William Snider
Bruce Johnson	Elisabeth Van Bockstaele
Jean Hardwick	Irwin Levitan, AMSNDC liaison
Kristen Keefe	Eric Wiertelak, FUN liaison
Michael Lehman	Carmen Canavier, PDC liaison
Michael Levine	Anne Etgen, PDC liaison
Barbara Lom	

Members Absent
Julio Ramirez, PDC liaison
Konrad Zinsmaier

Guest:
Richard Olivo, ERIN Project PI

SfN Staff:
Eun-Joo Chang, Senior Director, Membership and Professional Development
Erum Khan, Director, Professional Development Programs
Amy DeYoung, Manager, Professional Development Programs
Barry Black, Director, Membership and Marketing
Danielle Hanafin, Membership and Chapters Coordinator
Francine Asche, Online Community Manager

Introduction
CNDP Chair David Riddle opened the meeting with a welcome and introduction of the seven new CNDP members: Clivel Charlton, Jean Hardwick, Kristen Keefe, Barbara Lom, Cheryl Sisk, Eric Wiertelak who will serve as the FUN liaison, and Irwin Levitan, who fills the newly created liaison position for the Association of Medical School Neuroscience Department Chairpersons (AMSNDC). Julio Ramirez, the incoming liaison from the Professional Development Committee (PDC) couldn't be here. He then acknowledged and thanked the seven outgoing members of the committee (Albert Berrebi, Carmen Canavier, Anne Etgen, Bruce Johnson, Michael Lehman, Virginia Seybold, and Elisabeth Van Bockstaele).

Quick Items of Business

CNDP Spring 2011 Meeting Minutes: The committee unanimously approved the minutes from the spring 2011 meeting.

SfN Conflict of Interest Policy: CNDP members were asked to review the conflict of interest policy for SfN committee members which was included in the CNDP eBook, and to apprise the committee of any conflicts now and in the future.

Annual Meeting Events

CNDP Booth Schedule: David Riddle reviewed the timeslots for the NDP booth and asked for volunteers to give those double booked a break. Ms. DeYoung informed committee members that SfN staff would deliver the two computers to the booth each morning and return them to the SfN Headquarters each evening.

CNDP members recommended that booth volunteers point students to the online IP directory. Eun-Joo reminded everyone about using the booth to promote the 2012 spring NDP conference.

NDP Reception: CNDP members were reminded that the reception would take place on Sunday, November 13, from 6:30pm – 8:30pm at the Renaissance Washington in Mount Vernon B. The Undergraduate Travel Awards will be presented at the reception, as well as the Award for Education in Neuroscience to Julio Ramirez. CNDP members were asked to seek out potential IP members during the SfN annual meeting and to invite them to the NDP reception.

IP Membership: Barry Black provided an update on IP membership. As of November 12, 2011, 56 IP members have renewed their membership for 2012. Currently, there are 188 members, up from 177 members in 2010. Overall, SfN saw an increase in undergraduate applications, with 15 of the 18 new members being undergraduate programs; the other three are graduate programs. Currently, unlike for individual membership, there is no incentive for IP members to renew by 12/31. This is something the committee might want to consider if slow renewals becomes an issue.

In 2011, there were seven IP members from CY2010 that did not renew. The Membership and Marketing Department reached out to these programs, finding that five of them were no longer in operation. The other two programs were international (Beirut & Malaysia) and holdovers from ANDP days; CNDP had decided not to actively recruit international members at this time. It was noted that Malaysia's neuroscience program was suspended due to the lack of students enrolling in the program. . Eun-Joo reminded the committee that while CNDP recommended (and Council approved) a reduced fees structure for potential IP members from developing countries, the focus of IP membership recruitment will be on US and Canadian programs.

Barry advised that the new IP membership brochure would be mailed to the new 2011 IP members as well as to the 150 or so programs on the prospect list.

Elisabeth Van Bockstaele noted the low number of postdoctoral programs among IP members and recommended that the CNDP focus more on what they can do to boost the numbers in 2012. She suggested that the 2012 spring conference include sessions which would generate interest among postdoctoral programs.

Danielle Hanafin reminded CNDP members that institutions with both graduate and undergraduate programs have to apply separately for each program and pay membership dues for each level. Instituitions that have both a graduate and a postdoctoral program can pay a

reduced membership fee for the postdoctoral program if they pay dues for the graduate program.

Approval of New IP Membership Applications: CNDP members reviewed the two 2012 IP Membership applications --Northeastern University's Program in Behavioral Neuroscience (undergraduate) and Penn State University's Neuroscience Program (graduate). Hermes Yeh pointed out that Northeastern University's application seemed incomplete. CNDP members discussed the possibility that the questions on the application are not clear enough, hence the confusion on the institution's end. Danielle Hanafin noted that Northeastern submitted their application on an outdated form (2009) that included the old fee structure. The IP Membership application form was updated in 2011 and has been posted on the SfN website for quite some time. Danielle has already advised Northeastern of the updated fee structure.

The committee voted to approve Northeastern and Penn State University's IP Membership applications. The vote was all in favor, no one opposed and no one abstaining.

> *Action item:*
> Staff will notify the applicants of the approval and welcome them as new IP members.
> **Status: Completed**

David Riddle provided CNDP members with a brief overview of the role of the CNDP's Membership Subcommittee and asked for a volunteer to replace Elisabeth Van Bockstaele, who is rolling off the committee. Jean Hardwick volunteered; the subcommittee includes: David Riddle, Barry Connors, and Jean Hardwick.

Barry reminded the committee that once the subcommittee approves an IP membership applicaton, it is sent to the entire CNDP for final approval. In order to inform new members in a timely manner, CNDP members are asked to respond within seven days; the absence of a response will be accepted as a vote to approve the application.

Current Activities

Review of Past Action Items: CNDP members reviewed the following action items (refer to document in e-book) that have not yet been completed:

#10. *Disseminate more broadly results of biennial training programs survey to members and policy makers.* Eun-Joo confirmed that the results have not yet been published in SfN's journal. A summary article appeared in the Winter 2011 issue of NQ, and the full report by Ed Stricker is posted on SfN's Web site. There has not yet been discussion about how best to disseminate the report to a policy audience.

#12. *Pursue publication of the 2009 survey in* Journal of Undergraduate Neuroscience Education*.* CNDP members recommended that the results be published as a commentary instead of a full publication and from the perspective of undergraduate programs. CNDP members agreed that FUN members should develop the initial draft, with SfN staff weighing in prior to CNDP approval.

> *Action item:*

Staff will send a copy of the 2009 survey results (data set and Ed Stricker's full report) to Bruce, Eric, and Barb so they can work on an initial draft.
Status: Completed

#13. *Post IP e-newsletter on SfN's NDP Web page & archive past editions.* The latest IP e-newsletter is posted on SfN's NDP Web page; past editions have not yet been archived online. CNDP members discussed the length and layout of the e-newsletters and did not wish to make any changes at this time. It was noted that not all the CNDP members actually receive the newsletter, especially if they are not the primary or secondary contacts for the IP membership.

Action item:

- Staff will make available online past editions of the IP e-newsletter. **Status: Completed**
- Staff will add Bruce Johnson to the recipient list for the IP newsletter and ensure all CNDP members are receiving the newsletters. **Status: Completed**
- The 2012 IP e-newsletters will be sent in January, April, August and October (before the fall meeting). **Status: January completed, April in progress**
- Staff will take the lead on the development of the e-newsletter content. CNDP members were asked to suggest ideas to make the publications more dynamic. **Status: Ongoing**

#14. *Create a database of summer courses offered by IP members.* CNDP members discussed the value add to IP members to have access to a central database of summer research programs outside of their institutions. It would be useful to show as a table format with a column indicating whether or not the programs offer housing stipends. FUN has such a list for undergraduate programs, which SfN is welcome to use. CNDP members agreed that SfN would generate their own list in order to include both graduate and undergraduate programs. In the future, the CNDP may wish to consider a listing aimed at faculty rather than students – e.g., train-the-trainer programs and faculty workshops.

Action items:
- Include in the January IP newsletter a link to the FUN listing of summer research programs and encourage members to submit their programs, both for undergraduate and graduate students. **Status: Completed**
- Staff should add a question to IP renewal and new application forms asking for information about summer research programs.

#'s 16. *Address issues and suggestions regarding visibility of the training program directory and IP membership information on the SfN.org home page.* Staff reported that the button for the training program directory was enlarged and made more visible on the home page. In addition, a link to IP membership is available from the main Membership & Chapters dropdown menu. There still needs to be an easier way for IP members to access membership renewal and join information.

Action item:

Membership & Marketing staff will add a one-step membership renewal button to the IP membership page of sfn.org. **Status: Completed**

#19. *Encourage IP members to complete directory profile information.* Members noted that the information for many IP members seems to be incomplete. Danielle explained that when the data was converted from ANDP to SfN some of the fields changed, affecting the sync from the old system to the new system. Membership & Marketing are in the process of requesting profile updates from IP members in order to complete the data.

Action item:
Membership & Marketing will continue to address CNDP's recommendations regarding improving the visibility of the training program directory and IP membership information on the SfN home page. **Status: Ongoing**

#18. *Communicate to IP members about eligibility for service on CNDP.* The IP membership renewal and application forms were revised to include a place where IP members can name individuals eligible for CNDP service. A reminder will be included in the January newsletter.

Danielle informed CNDP members that the Membership and Marketing Department developed a new application form which asks for a committee nomination.

Action item:
Include in the January newsletter a reminder asking IP members to make these designations. **Status: Completed**

Action item:
Membership and Marketing will revised the IP application form so it requests two CNDP nominations instead of one.

#22. *Consider adding a board or poster displaying benefits of IP membership in the NDP booth.* CNDP members discussed implementing changes for the NDP Booth at the 2012 annual meeting.

Action item:
A poster displaying benefits of IP membership and a small round table with chairs will be added in 2012, along with the two laptops and projection screen. **Status: In progress**

Action item:
Staff will update the action items table to reflect above discussions and circulate to the CNDP as part of the e-book for the spring committee meeting. **Status: Completed**

Undergraduate Travel Awards: This was the inaugural year of the Undergraduate Travel Award Program, which was coordinated with FUN. Only IP members were eligible to submit student nominations. A total of 17 applications were received and seven awards were made at $750 each. The recipients will be honored at the NDP reception. CNDP members were encouraged to also attend the undergraduate travel award poster session organized by FUN.

2011-2012 NDP Survey: The survey was sent out the second week of October; a total of 38 graduate and 22 undergraduate programs have responded to date. Ramesh Raghupathi and Michael Lehman were thanked for assisting with reviewing and editing the survey. The CNDP will continue to take part in recommending changes for future surveys as well as ensuring the continuation of a longitudinal dataset.

This is the first year the survey is being managed directly by SfN, rather than by individuals at the University of Pittsburgh. SfN's evaluation specialist, Jacob Laden, is continuing to mine past datasets. December 15 was listed as the original due date; the survey will be left open until approximately one week after the spring conference.

> *Action item:*
> Following the SfN annual meeting, staff will send a reminder to those who have not yet completed the survey. **Status: Completed**

Report on Japan Neuroscience Society Meeting: David Riddle represented SfN at the Japan Neuroscience Society's annual meeting held in Yokohama in September. SfN has participated in the past on international panels organized at the JNS meeting, as Japan has the largest number of SfN members outside of the U.S. David was part of an international symposium on higher education and training that also included presentations from FENS (Federation of European Neuroscience Societies) and the Australian Neuroscience Society, as well as JNS. Attendees were interested in hearing about graduate neuroscience training in the U.S. and Canada. The possibility of future international collaboration in this area is unclear at this time, but SfN continues to maintain dialogue with JNS.

CNDP Nominations for 2012: CNDP members were reminded that the Committee on Committees (CoC) seeks recommendations for nominees for committee replacements. Three slots on CNDP are opening in 2012. A memo from David Riddle to the CoC is due by mid-March. Members can also nominate through the online system, which closes on Feb. 16.

> *Action item:*
> CNDP members should submit their recommendations to SfN staff and David for inclusion in the memo to CoC. **Status: Completed**

Spring 2012 Pre-Conference Workshop and NDP Conference: The 2012 Annual Spring Conference of the Neuroscience Departments and Programs will take place on Friday, March 30, in Washington, DC. The theme developed by the conference subcommittee is: *Sustaining Training Program Vitality During Difficult Times.* Steve Hyman, former Provost of Harvard University, has agreed to be the keynote speaker. Conference registration will open in early 2012.
Council had approved CNDP's proposal to organize a half-day hands-on workshop for program directors and department chairs to take place at SfN headquarters on the Thursday before the conference. The topic of the workshop has not yet been decided.

CNDP members discussed the evaluations from the 2011 NDP Spring Conference (included in the e-book) and feedback from attendees about possible workshop topics. The top four topics emerging from the post-conference survey were:

- Dissemination of best practices in neuroscience training and education (rating average: 4.06 out of 5);
- Preparing students for graduate school, various careers, and professional skills (rating average: 3.92 out of 5); and
- Recruiting practices for graduate programs (rating average: 3.90 out of 5); and
- Faculty development workshops on curriculum design and state-of-the-art teaching tools (rating average: 3.73 out of 5).

The survey respondents also conveyed the following:
- The likelihood that they would attend a half-day hands-on workshop on teaching neuroscience prior to the conference - rating average: 3.02 out of 5; and
- The likelihood that they would attend a half-day hands-on workshop on teaching neuroscience for a fee of $150 - rating average 2.32 out of 5.

Members discussed the idea of including lab work during the workshop. It was suggested that GWU or Georgetown may be an option. Another idea was to convert the "boot camps for new trainees" panel session for the conference into the theme for the workshop.

> *Action item:*
> Following the annual meeting, the subcommittee (David Riddle, Hermes Yeh, Michael Levine, Ramesh Raghupathi, Barry Connors, and Albert Berrebi) will schedule a conference call to finalize session topics and presenters for the conference, as well as to finalize a topic and plans for the workshop. **Status: Completed, workshop planning postponed.**

Update on the Educational Resources in Neuroscience (ERIN) Project: Richard Olivo provided an overview of the conceptualization and implementation of the ERIN project, which seeks to support undergraduate and graduate teaching of neuroscience by providing a portal to educational resources. Richard and SfN staff have been working with the technology vendor, Velir, to develop the ERIN site. A board of editors was assembled and met in July to begin the process of identifying and tagging resources. More than 600 high-quality resources were found and tagged and will form the initial core of ERIN's listings when the site is launched in late-March. The plan is to announce and introduce the site at the NDP spring conference.

SfN members will be able to share their expertise by nominating resources to be listed in ERIN's database, and by reviewing and rating materials they have used in their own teaching. Visitors to ERIN's site can search by specific topics, media types, educational levels and other characteristics of resources to enhance teaching and learning in neuroscience. The site will be open to all to view and download resources, but only SfN members will be able to review and nominate resources. There will also be a link on the site to the *NeurOnLine* community on neuroscience training and education, to encourage educators to have conversations about the teaching materials found on the ERIN site.

SfN Membership Enhancement Plan and Professional Development Strategic Plan Updates:
Eun-Joo gave an overview of SfN's all- member survey conducted in April 2011. The survey had an impressive 29% response rate. An advisory group appointed by Council was tasked with developing the survey questions and presenting findings to Council. Overall, the survey results

indicated strong membership satisfaction, a low level of awareness of many SfN programs, an interest in becoming more engaged, and the SfN annual meetings continuing to be one of the key motivators for membership. The indications were that SfN needs to create more value outside of the annual meeting and be more responsive to the needs of students/postdocs and international members. The Membership Survey Advisory Group has transformed into the Membership Enhancement Plan Working Group (MEPWG), which is tasked with developing specific recommendations to Council related to increasing member value and engagement. . Eun-Joo noted that there will likely be areas that intersect with CNDP interests, for example, looking for ways to create closer links and synergies between SfN chapters and IP members on issues such as advocacy, and professional/career development for students as well as faculty.

David discussed the Professional Development Working Group's (PDWG) 4-year strategic plan. The work of the group (David was a member) has ended, with implementation of specific initiatives falling to committees, mainly the PDC, but also to CNDP and others. The emphasis going forward is on developing online offerings (e.g. career resources through the NeuroJobs career center and *NeurOnLine*). For example, the PDC plans to develop videos on pursuing different career paths; videotaping will take place during the annual meeting as a pilot effort.

SfN will be audiotaping the NDP spring conference sessions. Members were asked to think about how SfN should package the content in the future.

CNDP Strategic Planning Status and Future Direction: David & Eun-Joo reviewed the Higher Education and Training Strategic Plan Priorities table that was provided in thee-book and the need for the committee to be more ambitious, to broaden its vision, about its goals as it continues to flesh out this plan.

Some Committee members asked about the item related to international training around responsible conduct. David explained that a number of the items relate to other committees and, in this case, is an initiative being addressed by SfN's International Affairs Committee. Committee members discussed CNDP's potential involvement in teaching "responsible conduct" in training and education (versus in research) and possible resources that could be used to assist programs with implementing such training.

With regard to the idea of conducting a survey of trainees, committee members were alerted to the European Council of Doctoral Candidates' Eurodoc Survey, which was sent to thousands of past trainees asking where they are now, what they are doing, what they thought of their training, etc. CNDP members agreed that the survey might be a useful resource in developing our own survey.

Eun-Joo reminded CNDP members that the FY2013 budget will be drafted in March 2012, with Council approval taking place in May. Therefore, if the committee has any burning high-priority items with budget implications for FY13, these would be good to float as ideas to Council now (David meets with Council on Wed.), with formal proposals being presented in May. Other than the trainee survey, no new initiatives were mentioned.

   Action item:

The CNDP should either devote time during the spring committee meeting or schedule a separate meeting to finalize the strategic plan so it can be presented to Council next summer. **Status: In progress**

NeurOnLine: Francine Asche provided CNDP members with a brief overview of *NeurOnLine* and asked for help with continuing to make it a success. *NeurOnLine* was launched in June 2011, and serves as a site is for SfN members to share science, network, forge collaborations or just keep in touch within a trusted forum. Currently, there are thirty-six communities (topics range from research, careers, outreach and advocacy, neuroscience education and training, annual meeting, SfN chapters, programs, and leadership). There has only been a small amount of discussion so far in the two communities related to neuroscience teaching and training, and CNDP members are encouraged to contribute to discussions in those communities. In addition, there are "closed" communities established for each SfN committee. Members are urged to use the site for committee business on a more regular basis.

Action item:
Staff will put committee materials/resources online in the CNDP community, and members agree to use the site to discuss and plan the committee's work.

* * *

Institutional Program Application Form

Society for Neuroscience (SfN) Institutional Program (IP) membership is available to academic departments and programs that award an undergraduate major or advanced degree in neuroscience or a neuroscience-related discipline. A neuroscience program is defined as a formal program at any educational or research facility that includes pre- or postdoctoral trainees with a primary interest in scientific investigation of the nervous system. This may include a variety of administrative structures, including, but not limited to a subsection of a larger department, a separate department, or an interdepartmental program.

As a SfN IP member, your program/department will be included in the Directory of Neuroscience Training Programs on the SfN Web site. Each IP member may designate up to two official representatives for each membership year, and designate one as the primary contact person.

Select One:

☒ **I would like to apply for a new membership.** (Application will be processed upon receipt of membership fee.)

> **Membership Fees**
> *Undergraduate Membership*: $105.00
> *Graduate or Postdoctoral Membership*: $275.00

☐ **Please list my program.** (I do *not* want to apply for an Institutional Program membership at this time. I understand that the following fees for nonmember programs apply.)

> *Undergraduate nonmember program fee*: $105.00
> *Graduate or Postdoctoral nonmember program fee*: $275.00

Part A - PROGRAM INFORMATION   * indicates a required field

*Type of Program: ☒ Undergraduate   ☐ Graduate   ☐ Postdoctoral
*Name of Member Program or Department: Neurobiology and Behavior
*Institution: Cornell University
*Program Web Address (URL): http://www.nbb.cornell.edu/
Degrees and Programs Available (e.g., BS/PhD Neurobiology, PhD Neuropharmacology, BA/BS Psychology, Behavioral Neuroscience Specialization): a. BS/ Biology with concentration in Neurobiology and Behavior b. Ph.D./Neurobiology and Behavior c.

Areas of Research Emphasis: Select all that apply from the list below:

☐	Aging	☐	Neurochemistry
☒	Behavioral Neuroscience	☒	Neuroendocrinology
☒	Biophysics and Channel Function	☒	Neurogenetics
☒	Cellular and Molecular Neuroscience	☒	Neuroimaging
☐	Cognitive Neuroscience	☒	Neuropharmacology
☒	Computational Neuroscience and Modeling	☒	Neurophysiology
☒	Developmental Neuroscience	☒	Motor Systems
☐	Glial Biology and Myelination	☒	Sensory Systems
☒	Learning and Memory	☐	Substance Abuse
☐	Neural Injury, Repair and Regeneration	☒	Synaptic Structure and Function
☐	Neurobiology of Disease	☒	Systems Neurobiology
☐	Other:		

Part B - CONTACT INFORMATION FOR INSTITUTIONAL PROGRAM MEMBER BUSINESS
(See Part D to list contact information for queries by students and other interested parties)

PRIMARY CONTACT (Receives dues notice and all SfN announcements)

Title: ☐ Department Chair ☐ Program Director ☐ Program Coordinator			
☒ Other Bruce R. Johnson			
Prefix: Dr.			Degree: PhD
*First Name: Bruce		*Last Name: Johnson	MI: R.
*Mailing Address: Neurobiology and Behavior, Seeley Mudd Hall			
Cornell University			
City: Ithaca	State: NY	Zip: 14853	Country: USA
*E-mail address: brj1@cornell.edu			
*Telephone Number: 607-254-4323		FAX Number: 607-254-1303	

SECONDARY CONTACT (Receives informational mailings but not dues notices)

Title: ☒ Department Chair ☐ Program Director ☐ Program Coordinator			
☐ Other			
Prefix: Prof.			Degree: PhD
*First Name: Kraig		*Last Name: Adler	MI: K.
*Mailing Address: Neurobiology and Behavior, Seeley Mudd Hall			
Cornell University			
City: Ithaca	State: NY	Zip: 14853	Country: USA
*E-mail address: kka4@cornell.edu			
*Telephone Number: 607-254-4340		FAX Number: 607-254-1303	

Part C - PROGRAM OR DEPARTMENT CHAIR/DIRECTOR

Title: ☐ Department Chair ☒ Program Director ☐ Program Coordinator			
☐ Other			
Prefix: Prof.			Degree: PhD
*First Name: Carl		*Last Name: Hopkins	MI: D.
*Mailing Address: Neurobiology and Behavior, Seeley Mudd Hall			
Cornell University			
City: Ithaca	State: NY	Zip: 14853	Country: USA
*E-mail address: cdh8@cornell.edu			
*Telephone Number: 607-255-2259		FAX Number: 607-254-1303	

Information submitted below, in Parts D and E, is published in the Directory of Neuroscience Training Programs on the SfN Web site.

Part D - CONTACT INFORMATION FOR EXTERNAL QUERIES

| Title: | ☐ Department Chair | ☒ Program Director | ☐ Program Coordinator |
| | ☐ Other | | |

Prefix: Prof.		**Degree:** PhD	
***First Name:** Carl		***Last Name:** Hopkins	**MI:** D.

| ***Mailing Address:** Neurobiology and Behavior, Seeley Mudd Hall |
| Cornell University |

City: Ithaca	**State:** NY	**Zip:** 14853	**Country:** USA

| ***E-mail address:** cdh8@cornell.edu |

***Telephone Number:** 607-255-2259	**FAX Number:** 607-254-1303

Part E - PROGRAM DESCRIPTION

Year Established: 1964	☒ **Program Currently Affiliated with T32 Grant Training**
Total # Faculty (Spring 2009): 19	**Total # Enrolled Full Time Students (Spring 2009):** 247 Neurobiology and Behavior concentrators in Biology

Total # Graduates in the Last Five Years: ~430
 # Faculty Who Have Supervised Student Theses Projects in Their Labs in the Last Five Years: ~65
Admission Information (Include text and/or URL: http://admissions.cornell.edu/
Stipends/Assistantships and Financial Assistance, if available: http://admissions.cornell.edu/costs-aid
How, if Necessary, to Apply for Stipends/Assistantships and Financial Assistance: http://admissions.cornell.edu/apply-for-aid

Annual Tuition and Fees Costs: $41,541 out of state	**Approximate Cost of Living per Year:** $15,584 (includes housing, dining, books/supplies, personal and miscellaneous expenses)

Housing Availability and Costs per Year: Dormitory or apartment rental, approx. $7,800
University-affiliated Daycare Facilities Availability and Costs per Month: see website for financial aid programs for student parents: http://studentparents.dos.cornell.edu/Financial.html

Written Descriptor of Program – Limited to 300 Words. Please provide all information about formal and informal training activities in neuroscience, including keywords that the search tool can use to find your program.

The Department of Neurobiology and Behavior (NB&B) has a distinguished faculty with interests ranging from the properties of single neurons and neural networks to the organization of animal societies. Research in the Department falls into five core areas: cellular and molecular neuroscience, systems neuroscience, computational neuroscience, chemical ecology, and animal social behavior. Faculty members have integrative programs of research that span different levels of analysis. The Department offers a wide range of courses and research opportunities, making it the most popular area of study for undergraduates majoring in biology.

The associated Graduate Field of Neurobiology and Behavior encompasses all aspects of neurobiological and behavioral research on Cornell's Ithaca campus. The graduate program's goal is to advance the understanding of neurobiology and behavior by training the next generation of scientists working at this interface.

DEMOGRAPHICS (optional)

% Non US Citizens: Cornell University undergraduates: 17%
 # Female: Cornell University undergraduates: 49% female

US Under-Represented Minorities
        # African American/Black (not of Hispanic origin): Cornell University undergraduates: 31% minority; information on individual ethnicities is unknown.
        # Hispanic or Latino origin: same as above
        # Native Americans: Indian, Hawaiian, Alaskan, or Pacific Islander: same as above
        # Other: same as above

SOCIETY FOR NEUROSCIENCE

Society for Neuroscience (SfN) Institutional Program (IP) membership is available to academic departments and programs that award an undergraduate major or advanced degree in neuroscience or a neuroscience-related discipline. A neuroscience program is defined as a formal program at any educational or research facility that includes pre- or postdoctoral trainees with a primary interest in scientific investigation of the nervous system. This may include a variety of administrative structures, including, but not limited to a subsection of a larger department, a separate department, or an interdepartmental program.

As a SfN IP member, your program/department will be included in the Directory of Neuroscience Training Programs on the SfN Web site. Each IP member may designate up to two official representatives for each membership year, and designate one as the primary contact person.

Select One:

☐ **I would like to apply for a new membership.** (Application will be processed upon receipt of membership fee.)

> **Membership Fees**
> *Undergraduate Membership*: $110.00
> *Graduate or Postdoctoral Membership*: $285.00

☒ **Please list my program.** (I do *not* want to apply for an Institutional Program membership at this time. I understand that the following fees for nonmember programs apply.)

> *Undergraduate nonmember program fee*: $110.00
> *Graduate or Postdoctoral nonmember program fee*: $285.00

Part A - PROGRAM INFORMATION * indicates a required field

*Type of Program: ☐ Undergraduate ☒ Graduate ☐ Postdoctoral
*Name of Member Program or Department: Interdisciplinary Neuroscience Program
*Institution: The University of Georgia
*Program Web Address (URL): http://biomed.uga.edu/divisions/neuroscience/programs-neuroscience-phd
Degrees and Programs Available (e.g., BS/PhD Neurobiology, PhD Neuropharmacology, BA/BS Psychology, Behavioral Neuroscience Specialization): a. Ph.D. Neuroscience b. c.

Areas of Research Emphasis: Select all that apply from the list below:

☐ Aging	☐	Neurochemistry
☒ Behavioral Neuroscience	☐	Neuroendocrinology
☐ Biophysics and Channel Function	☐	Neurogenetics
☒ Cellular and Molecular Neuroscience	☒	Neuroimaging
☒ Cognitive Neuroscience	☒	Neuropharmacology
☐ Computational Neuroscience and Modeling	☐	Neurophysiology
☒ Developmental Neuroscience	☐	Motor Systems
☐ Glial Biology and Myelination	☐	Sensory Systems
☐ Learning and Memory	☐	Substance Abuse
☐ Neural Injury, Repair and Regeneration	☐	Synaptic Structure and Function
☐ Neurobiology of Disease	☐	Systems Neurobiology
☐ Other:		

Part B - CONTACT INFORMATION FOR INSTITUTIONAL PROGRAM MEMBER BUSINESS
(See Part E to list contact information for queries by students and other interested parties)

PRIMARY CONTACT (Receives dues notice and all SfN announcements)

Title: ☐ **Department Chair**　☐ **Program Director**　☐ **Program Coordinator** ☒ **Other**　Assistant to the Director, Biomedical and Health Sciences Institute	
Prefix:	**Degree:**
***First Name:** Linda	***Last Name:** Buffington　　**MI:**
***Mailing Address:** Biomedical and Health Sciences Institute, S150 Coverdell Center 　　　　　The Univerisity of Georgia	
City: Athens　　**State:** GA　　**Zip:** 30602　　**Country:** USA	
***E-mail address:** lbuff@uga.edu	
***Telephone Number:** 706-542-2684	**FAX Number:** 706-542-5285

SECONDARY CONTACT (Receives informational mailings but not dues notices)

Title: ☒ **Department Chair**　☐ **Program Director**　☐ **Program Coordinator** ☐ **Other**	
Prefix: Dr.	**Degree:**
***First Name:** Philip	***Last Name:** Holmes　　**MI:** V
***Mailing Address:** 616 Psychology Bldg. 　　　　　The University of Georgia	
City: Athens　　**State:** GA　　**Zip:** 30602　　**Country:** USA	
***E-mail address:** pvholmes@uga.edu	
***Telephone Number:** 706-542-3105	**FAX Number:**

Part C - PROGRAM OR DEPARTMENT CHAIR/DIRECTOR

Title: ☐ **Department Chair**　☒ **Program Director**　☐ **Program Coordinator** ☐ **Other**	
Prefix: Dr.	**Degree:**
***First Name:** Harry	***Last Name:** Dailey　　**MI:**
***Mailing Address:** Biomedical and Health Sciences Institute, S150 Coverdell Center 　　　　　The University of Georgia	
City: Athens　　**State:** GA　　**Zip:** 30602　　**Country:** USA	
***E-mail address:** hdailey@uga.edu	
***Telephone Number:** 706-542-2684	**FAX Number:**

The SfN Committee on Neuroscience Departments and Programs (CNDP) oversees IP membership and programming. CNDP promotes IP membership and benefits, and develops programs and activities that support SfN's higher education and training strategy. We ask that you designate a member of your program to be eligible to serve on this committee. Please note that the nominee must be an active SfN member.

Part D - CNDP ELIGIBLE NOMINEE (*must be an SfN member*)

Title:	☒ Department Chair	☐ Program Director	☐ Program Coordinator
	☐ Other		

Prefix: Dr.		Degree: Ph.D.	
*First Name: Philip		*Last Name: Holmes	MI: V
*Mailing Address: Psychology Bldg. The University of Georgia			
City: Athens	State: GA	Zip: 30602	Country: USA
*E-mail address: pvholmes@uga.edu			
*Telephone Number: 706-542-3015		FAX Number:	

Information submitted below, in Parts E and F, is published in the Directory of Neuroscience Training Programs on the SfN Web site.

Part E - CONTACT INFORMATION FOR EXTERNAL QUERIES

Title:	☐ Department Chair	☐ Program Director	☒ Program Coordinator
	☐ Other		

Prefix: Dr.		Degree: Ph.D.	
*First Name: James		*Last Name: Lauderdale	MI:
*Mailing Address: 250B Coverdell Center The University of Georgia			
City: Athens	State: GA	Zip: 30602	Country: USA
*E-mail address: neurophd@uga.edu			
*Telephone Number: 706-542-5922		FAX Number:	

Part F - PROGRAM DESCRIPTION

Year Established: 2006	☐ Program Currently Affiliated with T32 Grant Training
Total # Faculty (Spring 2011): 30	Total # Enrolled Full Time Students (Spring 2011): 18
Total # Graduates in the Last Five Years: 8	
# Faculty Who Have Supervised Student Theses Projects in Their Labs in the Last Five Years: 11	
Admission Information (Include text and/or URL: http://biomed.uga.edu/divisions/neuroscience/programs-neuroscience-phd	
Stipends/Assistantships and Financial Assistance, if available:	
How, if Necessary, to Apply for Stipends/Assistantships and Financial Assistance:	
Annual Tuition and Fees Costs:	Approximate Cost of Living per Year:
Housing Availability and Costs per Year:	
University-affiliated Daycare Facilities Availability and Costs per Month:	

Written Descriptor of Program – Limited to 300 Words. Please provide all information about formal and informal training activities in neuroscience, including keywords that the search tool can use to find your program.

The Neuroscience Ph.D. Program at UGA is an interdisciplinary curriculum of research and coursework that awards doctoral degrees in Neuroscience. The Program involves more than 25 faculty representing nine departments. The interdisciplinary nature of neuroscience requires study across a range of topics. Thus, students typically interact with faculty in multiple departments. The objective of the Program is to provide graduate students with the broad academic background, technical expertise, and scientific scholarship necessary to continue their careers in the field of neuroscience.

DEMOGRAPHICS (optional)

% Non US Citizens:
 # Female:
US Under-Represented Minorities 　　　**# African American/Black (not of Hispanic origin):** 　　**# Hispanic or Latino origin:** 　　**# Native Americans: Indian, Hawaiian, Alaskan, or Pacific Islander:** 　　**# Other:**

Part G – PAYMENT

Sharon Milton

Part H – AUTHORIZATION

Date of Submission: 2/28/2012

SOCIETY FOR NEUROSCIENCE

Society for Neuroscience (SfN) Institutional Program (IP) membership is available to academic departments and programs that award an undergraduate major or advanced degree in neuroscience or a neuroscience-related discipline. A neuroscience program is defined as a formal program at any educational or research facility that includes pre- or postdoctoral trainees with a primary interest in scientific investigation of the nervous system. This may include a variety of administrative structures, including, but not limited to a subsection of a larger department, a separate department, or an interdepartmental program.

As a SfN IP member, your program/department will be included in the Directory of Neuroscience Training Programs on the SfN Web site. Each IP member may designate up to two official representatives for each membership year, and designate one as the primary contact person.

Select One:

☒ **I would like to apply for a new membership.** (Application will be processed upon receipt of membership fee.)

> **Membership Fees**
> *Undergraduate Membership*: $110.00
> *Graduate or Postdoctoral Membership*: $285.00

☐ **Please list my program.** (I do *not* want to apply for an Institutional Program membership at this time. I understand that the following fees for nonmember programs apply.)

> *Undergraduate nonmember program fee*: $110.00
> *Graduate or Postdoctoral nonmember program fee*: $285.00

Part A - PROGRAM INFORMATION   * indicates a required field

*Type of Program: ☐ Undergraduate   ☒ Graduate   ☐ Postdoctoral
*Name of Member Program or Department: Department of Anatomy & Neurobiology Graduate Program
*Institution: University of Puerto Rico School of Medicine
*Program Web Address (URL): http://www.md.rcm.upr.edu/anatomyneurobiology
Degrees and Programs Available (e.g., BS/PhD Neurobiology, PhD Neuropharmacology, BA/BS Psychology, Behavioral Neuroscience Specialization): a.   PhD (Anatomy with Certification of Specialization in Neuroscience) b.   MS (Anatomy with Certification of Specialization in Neuroscience) c.

Areas of Research Emphasis: Select all that apply from the list below:

☐	Aging	☐	Neurochemistry
☒	Behavioral Neuroscience	☒	Neuroendocrinology
☒	Biophysics and Channel Function	☒	Neurogenetics
☒	Cellular and Molecular Neuroscience	☒	Neuroimaging
☒	Cognitive Neuroscience	☐	Neuropharmacology
☐	Computational Neuroscience and Modeling	☒	Neurophysiology
☒	Developmental Neuroscience	☒	Motor Systems
☐	Glial Biology and Myelination	☒	Sensory Systems
☒	Learning and Memory	☒	Substance Abuse
☒	Neural Injury, Repair and Regeneration	☒	Synaptic Structure and Function
☐	Neurobiology of Disease	☒	Systems Neurobiology
☐	Other:		

Part B - CONTACT INFORMATION FOR INSTITUTIONAL PROGRAM MEMBER BUSINESS
(See Part E to list contact information for queries by students and other interested parties)

PRIMARY CONTACT (Receives dues notice and all SfN announcements)

Title:	☒ Department Chair	☐ Program Director	☒ Program Coordinator	
	☐ Other			

Prefix:		Degree: PhD	

*First Name: María		*Last Name: Sosa		MI: A.

*Mailing Address: Dept. Anatomy & Neurobiology UPR School of Medicine PO Box 365067

City: San Juan	State: PR	Zip: 00936	Country: USA

*E-mail address: maria.sosa@upr.edu

*Telephone Number: 787-758-2525 x1514, 1500	FAX Number: 787-767-0788

SECONDARY CONTACT (Receives informational mailings but not dues notices)

Title:	☐ Department Chair	☐ Program Director	☐ Program Coordinator	
	☒ Other Faculty Member			

Prefix:		Degree: PhD	

*First Name: Mark		*Last Name: Miller		MI: W.

*Mailing Address: Institute of Neurobiology 201 Calle Norzagaray

City: San Juan	State: PR	Zip: 00901	Country: USA

*E-mail address: mark.miller@upr.edu

*Telephone Number: 787-721-4149 x279, 247	FAX Number: 787-725-3804

Part C - PROGRAM OR DEPARTMENT CHAIR/DIRECTOR

Title:	☒ Department Chair	☐ Program Director	☒ Program Coordinator	
	☐ Other			

Prefix:		Degree: PhD	

*First Name: María		*Last Name: Sosa		MI: A.

*Mailing Address: Dept. Anatomy & Neurobiology UPR School of Medicine PO Box 365067

City: San Juan	State: PR	Zip: 00936	Country: USA

*E-mail address: maria.sosa@upr.edu

*Telephone Number: 787-758-2525 x1514, 1500	FAX Number: 787-767-0788

The SfN Committee on Neuroscience Departments and Programs (CNDP) oversees IP membership and programming. CNDP promotes IP membership and benefits, and develops programs and activities that support SfN's higher education and training strategy. We ask that you designate a member of your program to be eligible to serve on this committee. Please note that the nominee must be an active SfN member.

Part D - CNDP ELIGIBLE NOMINEE (*must be an SfN member*)

Title: ☐ Department Chair ☐ Program Director ☐ Program Coordinator ☒ **Other** Faculty	
Prefix:	**Degree:** PhD
*First Name: Mark	*Last Name: Miller MI: W.
*Mailing Address: Institute of Neurobiology 201 Calle Norzagaray	
City: San Juan State: PR Zip: 00901 Country: USA	
*E-mail address: mark.miller@upr.edu	
*Telephone Number: 787-721-4149 x279, 247 FAX Number: 787-725-3804	

Information submitted below, in Parts E and F, is published in the Directory of Neuroscience Training Programs on the SfN Web site.

Part E - CONTACT INFORMATION FOR EXTERNAL QUERIES

Title: ☒ **Department Chair** ☐ Program Director ☒ **Program Coordinator** ☐ **Other**	
Prefix:	**Degree:** PhD
*First Name: María	*Last Name: Sosa MI: A.
*Mailing Address: Dept. Anatomy & Neurobiology UPR School of Medicine PO Box 365067	
City: San Juan State: PR Zip: 00936 Country: USA	
*E-mail address: maria.sosa@upr.edu	
*Telephone Number: 787-758-2525 x1514, 1500 FAX Number: 787-767-0788	

Part F - PROGRAM DESCRIPTION

Year Established: 2005	☐ **Program Currently Affiliated with T32 Grant Training**
Total # Faculty (Spring 2011): 17	**Total # Enrolled Full Time Students (Spring 2011):** 17
Total # Graduates in the Last Five Years: 4	
# Faculty Who Have Supervised Student Theses Projects in Their Labs in the Last Five Years: 15	
Admission Information (Include text and/or URL: http://www.md.rcm.upr.edu/biomed/qualifications.php	
Stipends/Assistantships and Financial Assistance, if available: Yes	
How, if Necessary, to Apply for Stipends/Assistantships and Financial Assistance: At time of admission	
Annual Tuition and Fees Costs: $4,600	**Approximate Cost of Living per Year:** $20,000
Housing Availability and Costs per Year: No campus housing; private student housing available near campus, average annual cost of $3,600-$7,200	
University-affiliated Daycare Facilities Availability and Costs per Month: None	

Written Descriptor of Program – Limited to 300 Words. Please provide all information about formal and informal training activities in neuroscience, including keywords that the search tool can use to find your program.

The program provides the students with formal course instruction in the traditional anatomical sciences with the opportunity of further specializing via elective courses and training in the research laboratory in various areas of the neurosciences, including cellular and molecular neurobiology, molecular and genetic basis of development and regeneration of hair cells and the neuromuscular junction, mammalian motor systems and spinal cord function, behavioral neuroendocrinology, neurobiology of addictions, neural basis of behavior and rythmic activity in the nervous system of invertebrates, neurobiology of anxiety and emotional memory, prefrontal amygdala, fear conditioning, cognitive neuroscience, receptor recycling, and neural mechanisms of action of alcohol and opiate drugs. Formal coursework is usually completed during the first 2 years of the program. Research lab rotations start on the second semester of the first year. The average completion time for the doctoral program is 5-6 years.

DEMOGRAPHICS (optional)

% Non US Citizens: 0
 # Female: 53%

US Under-Represented Minorities
        # African American/Black (not of Hispanic origin): 0
        # Hispanic or Latino origin: 100%
        # Native Americans: Indian, Hawaiian, Alaskan, or Pacific Islander: 0
        # Other:

Neuroscience Departments and Programs
2012 Annual Spring Conference

Sustaining Training Program Vitality During Challenging Times

Friday, March 30, 2012

7:30 – 8:30am   **Registration/Continental Breakfast**
Location: Franklin AB, 1st floor

8:30 – 8:45am   **Welcome and Opening Remarks**
David R. Riddle *(Wake Forest University School of Medicine)*
Chair, Committee on Neuroscience Departments and Programs (CNDP)

8:45 – 9:30am   **Neuroscience Education & Training in a Time of Fiscal and Structural Challenge**
Steven Hyman *(Broad Institute)*
former provost, Harvard University

9:30 – 10:45am   **Letting Challenges Drive Creativity and Invention**
Steven Hyman *(Broad Institute)*
Karen Gale *(Georgetown University)*
Bruce Johnson *(Cornell University)*
Ramesh Raghupathi *(Drexel University)*
Alan Sved *(University of Pittsburgh)*

10:45 – 11:00am   **Break**

11:00 – 12:15pm   **Providing Opportunities for Non-Traditional Career Choices**
Jenny Douglas *(West Virginia University)*
Teresa Esch *(Journal of Neuroscience)*
Patrick Forcelli *(Georgetown University)*
Christopher Tobias *(Dudnyk)*

12:15 – 1:15pm   **Lunch**
Discussions on workshop topics for 2013

1:15 – 1:45pm   **Report-out from Lunchtime Discussions**

1:45 – 2:30pm   **International Exchange Programs to Enhance Neuroscience Education**
Mary Harrington *(Smith College)*
Aaron Newman *(Dalhousie University, TANTEN)*

2:30 – 2:45pm   **Faculty for Undergraduate Neuroscience (FUN) Update**
Elaine Reynolds *(Lafayette College)*
President, FUN

2:45 – 3:15pm   **Educational Resources in Neuroscience (ERIN) Project**
Richard Olivo *(Smith College)*

3:15 – 3:30pm   **Department Chair Training to Increase Women in Neuroscience (IWiN) Project Update**
Eun-Joo Chang *(Society for Neuroscience)*
Senior Director for Membership and Professional Development

3:30 –3:45pm   **Break**

3:45 – 5:00pm   **Neuroscience Boot Camp for Graduate Recruits**
Barry Connors *(Brown University)*
Virginia Seybold *(University of Minnesota)*

5:00 – 5:15pm   **Closing Remarks**

5:30 – 7:30pm   **Reception**
Location: Franklin C, 1st floor

Meeting Participants Contact List 2012 Annual Spring Conference of Neuroscience Departments and Programs			
Jennifer Aumiller, M.Ed. (410) 706-4701 **neurosci@umaryland.edu**		University of Maryland, Baltimore Program in Neuroscience	Baltimore, MD
Mark E. Basham, PhD (303) 458-4976 **mbasham@regis.edu**		Regent University Neuroscience Program	Denver, CO
Andrew Bean, PhD (713) 500-5614 **a.bean@uth.tmc.edu**		University of Texas Health – Houston Department of Neurobiology & Anatomy Neuroscience Graduate Program	Houston, TX
Kim Blackwell, VMD, PhD (703) 993-4381 **kblackw1@gmu.edu**		George Mason University Neuroscience PhD Program	Fairfax, VA
Janet M. Blanks, PhD (561) 297-4310 **blanks@fau.edu**		Florida Atlantic University Center for Complex Systems & Brain Sciences	Boca Raton, FL
Scott T. Brady, PhD (312) 996-6791 **stbrady@uic.edu**		University of Illinois at Chicago Anatomy & Cell Biology	Chicago, IL
Helen Bramlett, PhD (305) 243-8926 **hbramlett@med.miami.edu**		University of Miami Millar School of Medicine Neuroscience Program	Miami, FL
Laura Carruth, PhD (404) 413-5340 **lcarruth@gsu.edu**		Georgia State University Neuroscience PhD Program	Atlanta, GA
James Eliassen, PhD (513) 558-7086 **james.eliassen@uc.edu**		University of Cincinnati Neuroscience Graduate Program	Cincinnati, OH
Jim Fadel, PhD (803) 216-3505 **jim.fadel@uscmed.sc.edu**		University of South Carolina Department of Pharmacology, Physiology & Neuroscience	Columbia, SC
Janet Finlay, PhD (360) 650-671 **janet.finlay@wwu.edu**		Western Washington University Behavioral Neuroscience	Bellingham, WA
Linda K. Gorman, PhD (410) 516-3868 **lgorman1@jhu.edu**		Johns Hopkins University Neuroscience Undergraduate Program	Baltimore, MD
Richard Hyson, PhD (850) 644-5824 **hyson@neuro.fsu.edu**		Florida State University Program in Neuroscience	Tallahassee, FL
Tuula Jalonen, PhD (473) 444-4175 **tjalonen@sgu.edu**		St. George's University University School of Medicine	St. George's, Grenada
Michelle Jones-London, PhD (901) 451-7966 **jonesmiche@ninds.nih.gov**		NIH/NINDS National Institute of Neurological Disorders & Stroke	Bethesda, MD
Sharon Juliano, PhD (301) 295-3673 **sjuliano@usuhs.edu**		Uniformed Services University of the Health Sciences Neuroscience	Bethesda, MD
Zaven Kaprielian, PhD (718) 430-2162 **zaven.kaprielian@einstein.yu.edu**		Albert Einstein College of Medicine of Yeshiva University Dominick P. Purpura, Department of Neuroscience	Bronx, NY
Darcy Kelley, PhD (212) 854-4939 **dbk3@columbia.edu**		Columbia University Graduate Program in Neurobiology & Behavior	New York, NY

Bruce Krueger, PhD (410) 706-4701 **neurosci@umaryland.edu**		University of Maryland, Baltimore Program in Neuroscience	Baltimore, MD
Caurnel Morgan, PhD (979) 862-1991 **camorgan@tamu.edu**		Texas A&M University Institute for Neuroscience	College Station, TX
Rae Nishi, PhD (802) 656-4504 **rnishi@uvm.edu**		University of Vermont Neuroscience Graduate Program	Burlington, VT
John Oberdick, PhD (614) 292-8714 **oberdick.1@osu.edu**		Ohio State University Neuroscience Graduate Studies Program	Columbus, OH
Lynne Oland, PhD (520) 621-7215 **oland@email.arizona.edu**		University of Arizona Department of Neuroscience	Tucson, AZ
John Olschowka, PhD (585) 275-8238 **john.olschowka@urmc.rochester.edu**		University of Rochester Neuroscience Graduate Program	Rochester, NY
Ian Paul, PhD (601) 984-5898 **ipaul@umc.edu**		University of Mississippi Medical Center Graduate Program in Neuroscience	Jackson, MS
Nivia L. Pérez-Acevedo, PhD (787) 758-2525 **nivia.perez@upr.edu**		University of Puerto Rico School of Medicine Department of Anatomy & Neurobiology	San Juan, PR
Jennifer Ravelli (215) 204-3441 **jennifer.ravelli@temple.edu**		Temple University College of Liberal Arts Neuroscience Program	Philadelphia, PA
Angeles Ribera, PhD (303) 724-4517 **angie.ribera@ucdenver.edu**		University of Colorado Anschutz Medical Campus Neuroscience Program	Aurora, CO
Aldo Rustioni, MD (919) 966-6808 **aldo_rustioni@med.unc.edu**		University of North Carolina Neurobiology Curriculum	Chapel Hill, NC
Kim Seroogy, PhD (513) 558-7086 **kim.seroogy@uc.edu**		University of Cincinnati Neuroscience Graduate Program	Cincinnati, OH
Cheryl Stucky, PhD (414) 955-8373 **cstucky@mcw.edu**		Medical College of Wisconsin Neuroscience Doctoral Program	Milwaukee, WI
Jeffrey Tasker, PhD (504) 862-8726 **tasker@tulane.edu**		Tulane University Neuroscience Program	New Orleans, LA
Mark Wallace, PhD (315) 936-6709 **mark.wallace@vanderbilt.edu**		Vanderbilt University Vanderbilt Brain Institute	Nashville, TN
Joyce Yen, PhD (206) 543-4605 **joyceyen@uw.edu**		University of Washington ADVANCE Center for Institutional Change	Seattle, WA

Higher Education and Training Strategy

Strategic Issue:

Members have expressed a strong desire for SfN to focus more on undergraduate and graduate teaching of neuroscience to better serve the needs of the large segment of SfN's membership engaged in training new generations of neuroscientists. Further, as the field of neuroscience continues to attract growing numbers of trainees, the profession can benefit from greater coordinated engagement of and support for the "stewards of the discipline."

Desired Outcomes:

- Increased visibility for and communication with members on issues of neuroscience education and training as an element of SfN's mission and strategic plan.
- Needs and interests of neuroscience departments and programs and their trainees are effectively met.
- Increased resources (both internal and external) and programs to support training and education goals.
- Availability of a comprehensive source of neuroscience teaching resources for faculty through an online educational resources portal.
- Increased and coordinated participation of academic institutions, as a group, in SfN's advocacy efforts to inform policymakers about neuroscience research and workforce needs.
- Effective integration of a new class of institutional members (neuroscience depts. and programs) into SfN's membership structure.

Guiding Principles:

- Serve as a focal point for neuroscience educators and their institutions, while creating added value for members through combined and expanded resources dedicated to neuroscience education and training.
- Dept. heads and training directors and their trainees, as a group, have interests and needs that go beyond the services and benefits SfN currently provides to its individual members.
- Seek and engage leaders of neuroscience departments and programs who have significant history of involvement in advancing education and research training in academic neuroscience.
- Leverage and build upon successful approaches and programs developed by the Association of Neuroscience Departments and Programs (ANDP) and the Faculty for Undergraduate Neuroscience (FUN), as well as international partners engaged in neuroscience education and training.
- Effectively engage Institutional Program members to influence policy and decisions by joining voices and visibility on issues pertaining to higher education and training in neuroscience.
- Maintain close collaboration and coordination and build relations with other organizations, including FUN, the Association of Medical School Neuroscience Department Chairpersons (AMSNDC) and the Network of European Neuroscience Schools (NENS), that represent the interdisciplinary domains in which neuroscience programs and departments can reside.
- Ensure close coordination and synergy with SfN's professional development and diversity strategies.

Action Plan:

1. Develop a three-year plan for higher education and training, outlining resources needed and a plan to monitor and measure impact of outcomes, identifying those priority areas where SfN is uniquely positioned to add value. Include the following activities:
   a. Conduct a needs assessment survey of neuroscience training programs to inform the planning process.
   b. Provide online resources for neuroscience education and training, including a searchable directory of neuroscience training programs in North America and around the globe.
   c. Conduct a biennial survey of neuroscience education and training that provides key information on current trends in trainees, faculty and programs.
   d. Conduct an annual spring meeting for neuroscience departments and programs.
   e. Organize events during the SfN annual meeting that serve SfN's Institutional Program members.
   f. Recognize outstanding contributions to neuroscience education and training through an annual award to be presented at the SfN annual meeting.
2. Strengthen existing partnerships and identify potential new partners for collaborative activities in support of professional development needs/concerns of members engaged in teaching neuroscience.
   a. Expand linkages and coordination with FUN and other relevant organizations, including those outside North America.
   b. Seek to engage SfN chapters as active partners in implementing the higher education and training strategy.
3. Provide input and guidance for the development of a higher education teaching resource portal. (Tentative: pending external funding)

Committee of Neuroscience Departments and Programs Charter

Mission

To enhance the value SfN provides to its individual and institutional members (neuroscience departments and programs) through programs, activities, and initiatives that advance education and research training in academic neuroscience by providing opportunities for professional development, networking, outreach, and information sharing targeting educators and learners in higher education.

Responsibilities

Advise

- Serve as a source of information to Council on higher education issues and members' needs related to the training and education of future neuroscientists.
- Recommend to Council initiatives designed to encourage and support the achievement of SfN's strategic goals in the domain of higher education and training.
- Recommend policies on Institutional Program (IP) membership initiatives, benefits, categories and fees.

Monitor

- Monitor trends in neuroscience education/training and potential funding and collaboration opportunities to further SfN goals in this area.

Manage Activities

- Oversee recruitment of new and lapsed Institutional Program Members.
- Review and approve all initial requests for new IP membership (this may be done by the full committee or its chair), and refer any denials to Council for further review.
- Plan and oversee annual spring meeting of neuroscience depts. and programs, including program of speakers and panels addressing various aspects of neuroscience education and research.
- Manage biennial survey of neuroscience education and training that provides key information on current trends in trainees, faculty and programs.
- Develop and manage approved workshops and other activities related to neuroscience education and training during and outside the SfN annual meeting.
- Promote the presence and importance of the community of higher education in neuroscience at the annual meeting and ongoing committee activities throughout the year.

Coordinate and Communicate

- Facilitate communications, outreach, and feedback to SfN from the training and higher education community.

- Collaborate and coordinate activities with the committees in the Higher Education & Professional Development Cluster. The C-NDP chair will serve as the committee's representative on the Cluster's steering committee.
- Encourage and facilitate involvement of neuroscience depts. and programs in SfN's advocacy efforts including annual Hill Day and other outreach activities that inform policymakers about neuroscience research and workforce needs and provide opportunities to promote issues related to support for neuroscience research and training.
- Maintain communication, coordination, and collaboration with the Faculty for Undergraduate Neuroscience (FUN) and other relevant partner organizations.
- Facilitate outreach to and information-sharing with SfN's growing international membership and neuroscience departments and programs outside North America.

Composition

The committee consists of a chair and standard committee members who serve a three-year term. The incoming chair serves as an ex officio member of the committee. Membership on the committee is limited to designated representatives of SfN Institutional Program Members. Committee members include a liaison from FUN and from SfN's Committee on Diversity in Neuroscience and Committee on Women in Neuroscience, each of whom must also be an Institutional Program Member representative. Committee members and the chair are recommended by the Committee on Committees, with input from the C-NDP, and approved by the SfN Council.

Schedule

The committee will meet twice per year -- once during the SfN annual meeting and once in the spring at SfN headquarters, in conjuction with the annual meeting of neuroscience departments and programs. Additional committee work is conducted by e-mail and regularly scheduled conference calls throughout the calendar year to address issues that arise between meetings of the full committee.

HIGHER EDUCATION & TRAINING STRATEGIC PLAN PRIORITIES: UPDATE (November 2011)

(Purple = initiated or completed; Green = high priority; orange = medium priority)

CONSTITUENCY/NEEDS	GOALS/STRATEGIES	PROGRAM/ACTIVITY	HOW, WHERE, WITH WHOM/ STATUS
ALL			
IP members need common advocacy voice for increased funding for neuroscience training.	Increased and coordinated participation of academic institutions, as a group, in SfN's advocacy efforts to inform policymakers about neuroscience research and workforce needs.	Develop policy statement to NIH Director's office regarding "de-Balkanizing" funding for neuroscience training.	Discussed at March 2011 meeting; subcommittee formed to draft.
IP members need opportunities to network and to feel part a like-minded community.	Increased visibility for and communication with members on pertinent issues, using various communication and information vehicles to "touch" members on a regular basis. Including better dissemination of biennial survey results.	Electronic newsletter for distribution to IP members on a monthly or quarterly basis.	Four issues sent to date: Nov. 2010; Jan, May, Oct. 2011.
		Enhance/expand SfN Web page content for NDPs/IP members.	SfN staff w/CNDP input.
		Establish online community for IP members to network and communicate among themselves.	NeurOnLine launched June 2011 - 2 relevant communities: nsci ed & training; history, teaching, etc.
Current and potential IP members need to see value of membership & receive tangible value.	Increased number of new and renewing IP members, including particular emphasis on Canada, through targeted marketing efforts that better communicate value proposition.	Identify pool of potential IP members, and develop marketing materials and efforts to recruit new members, as well as to encourage renewals.	IP brochure created; increased marketing efforts. 2011 IP membership = 188, up from 177 in 2010.
	Increased visibility of NDP directory and promiotion of directory as a member value.	Develop marketing/communications campaign.	search engine optimiziation; newsletters; annual mtgs.
Some IP members have an international agenda.	Serve as a source of information for IP members that want to engage internationally.	Gather and post information online.	
Trainees at all level need to be provided with training on responsible conduct in research & publications.	Disseminate guidelines, best practices, and training materials to IP members for incorporation into their teaching activities.	Develop training materials/toolbox on responsible conduct. Develop speakers bureau on topic.	SfN conducted responsible conduct workshop in China; contract w/Zigmond-Fischer to develop training modules.
Undergraduate programs (self-identified, may include programs outside of Neuroscience)			
Undergraduate trainees need more opportunities to develop skills that will enable them to effectively transition to graduate training in neuroscience.	Facilitate connections between undergrads and graduate programs.	Distribute list of posters presented during FUN/Diversity poster sessions to graduate programs	e-mail blasts & flyers at Neuroscience 2010.
	Increase undergrads' access to summer training and research opportunities.	Create listing of summer training/ research opportunities & post online	IP members provide links to programs for inclusion in separate database. Not yet initiated.
	Recognize outstanding undergrads who submit abstract to SfN annual meeting.	New SfN Travel Award Program for undergrads proposed by PDWG and approved by Council	Award Program launched in 2011. Seven awardees selected by CNDP.
Undergraduate faculty need prof'l development opportunities on research, teaching, grantwriting, etc.		Develop research/grant writing workshops for undergraduate faculty. Continue teaching workshops.	Deliver at annual meeting, online, and at regional and chapter levels.
	Support teaching efforts through increased availability of easy-to-access teaching resources in neuroscience	Online teachings resources: beyond just ERIN portal, to make more accessible.	ERIN project underway, with site to launch March 2012. Other resources created can be posted on SfN's Web site +/or *NeurOnLine* .
	Facilitiate undergraduate faculty maintaining active research careers	Create list of collaborative research opportunities for undergrad faculty	w/FUN.
		Directory of speakers willing to visit undergraduate institutions	w/FUN.
Lack of research equipment		Promote scientific equipment loan and/or recycling program	w/FUN.
		Partnership with FUN to support small grants program for PI's	w/FUN.
Graduate Programs			
Need to secure funding for training programs		Offer workshops on range of grant mechanisms: T32, RSA, etc.	NDP annual conferences; online?

	Increase IP members' ability to raise awareness among graduate students re: variety of neuroscience careers, including outside academia.	**Develop resources/toolkits that can be used by IP members at career days, etc.**	**Online resources. Coordinate with PDC.**
Training outcomes evaluations at program level		**Online toolkit, training workshops, questionnaires, handbooks. Sharing best practices for tracking graduates of programs. Make CID resources available online.**	
Faculty need access to teaching resources.	(see undergraduate section above)		
Recruiting students, including URMs	Increase number of URM graduate students at IP member institutions.		
Postdoctoral Programs			
IP members need to provide postdocs with career planning advice, esp. re: alternative careers	Increase likelihood that postdocs are able to find employment in their chosen professions, including various career paths.	**Career development info, resources, and training targeted to postdocs.**	**Coordinate with PDC - online, at SfN annual meeting, NDP spring conference, etc.**
Postdocs seeking training or research abroad need info about opportunities	Encourage and facilitate cross-border training by providing information on international postdoc opportunities	**Research and create online resource of information on postdoctoral training opportunities abroad**	**Collaborate with FENS/NENS, IBRO regional committees, etc.**
IP members want to recruit more URM postdocs	Increase number of URM postdocs at IP member institutions.		
Training and encouraging postdoc teaching	Share best practices on postdoc team-teaching, etc.		
Postdocs coming from other disciplines need stronger background in neuroscience			
Program Directors (overlaps with graduate and postdoc programs)			
Community building across programs with different disciplinary homes and dveloping common expectations across programs.	Offer opportunities for neuroscience program directors to network and learn from each other.	**Targeted activities for program directors incorporated into annual conference. Online professional networking community.**	**Half-day workshop planned for Spring 2012 conference. Online communities now exist via *NeurOnLine*.**
	Maintain close collaboration and coordination and build relations with other organizations concerned with issues of neuroscience training.	Identify organizations and opportunities for collaboration (incl. FUN, Association of Medical School Neuroscience Dept. Chairpersons (AMSNDC), and Network of European Neuroscience Schools (NENS).	**Starting fall 2011, President of AMSNDC will be ex officio member of CNDP. Reciprocal exchange visits have occurred with NENS.**
	Collect timely information on students to better prepare for financial needs.	**Survey SfN student members on stipends, tuition and other information**	**Too specific to include in 2011 all-membership survey. Consider separate survey.**
Resources needed to help recruit and better serve needs of international students training in US.	Increase availability of information for IP members to help them recruit, better integrate, and support their int'l students (e.g., visa & career development issues).	Gather information and develop tools to help programs serve int'l students and better integrate them.	Research existing best practices; create online toolkits.
International Programs			
Int'l neuroscience depts. & programs may have an interest in being part of SfN's community of IP members.	While not proactively seeking international IP members at this time, SfN should remain open to any NDP wanting to join and offer regular membership status to int'l members. Also, facilitate participation by NDPs in developing countries through reduced dues.	**Revise IP membership policies to eliminate Int'l Affiliate category and create reduced dues categories for developing countries, consistent with SfN's policies for individual members.**	**Proposal approved by Council and went into effect for 2011 membership year.**
Other countries may be interested in learning from experience of NDPs in US/Canada.	Exchange information and be open to opportunities to collaborate with regional and national societies in support of common goals in neuroscience higher education and training.	**Engage in selected partnerships and collaborations with int'l/national societies to further information exchange with int'l NDPs.**	**NENS/FENS (attend NENS 2011 meeting); joint symposium at Japan Neuroscience Society's 2011 annual meeting.**
		Develop global directory of neuroscience training programs. [from SfN int'l membership survey]	Online; partnership w/NENS and national societies.
SfN/CNDP needs to better understand role and needs of int'l NDPs.	Research status & needs of int'l NDPs and desires (if any) and potential to be part of SfN's IP membership community.	Conduct needs assessment of NDPs in other countries/regions, as appropriate, to determine opportunities for engaging them in SfN through IP membership.	In partnership w/regional and national societies.

The SfN Budget, Planning, and Committee Meeting Cycle

The SfN fiscal year runs from July 1 through June 30

January	Goals are created to help drive the creation of the budget for the fiscal year starting in July.
February-April	SfN prepares budgets based on approved goals. SfN committees meet. Because budgets are already in process, most new budget-related proposals from committees will need to be proposed for the following fiscal year. Proposals to Council may be submitted at any of the three regular Council meetings.
May	SfN Council meets and approves the budget for the fiscal year starting in July. SfN staff committee liaisons present committee meeting reports and proposals to Council.
August	SfN Council meets and discusses strategic issues that drive program and budget development for the following year, including multi-year planning targets.
October-November	SfN annual meeting – SfN Council and committee meetings. Committee chairs present committee meeting reports and proposals to Council.

I. INTRODUCTION

Background
Council, at its summer 2008 meeting, began to explore the need for a professional development (PD) strategy for SfN that would address the strong desire expressed by members in the Society's 2007 membership survey for greater PD opportunities, particularly outside the annual meeting. Council recognized the gaps in SfN's current programming, including the evolving needs of SfN's growing cohort of student members (who relate and communicate in new ways) and of international members. At that summer meeting, Council first articulated the key career stages and transitions in the full "life cycle" of a neuroscientist, an approach to identifying needs that has informed subsequent thinking on this topic.

In part to better grapple with the key cross-cutting professional development challenges facing SfN, Council approved in May 2009 a revised organizational strategy for professional development and creation of a new Professional Development Committee (PDC) that incorporated the Committee on Diversity in Neuroscience (CDIN) and Committee on Women in Neuroscience (CWIN). At the same time, SfN's international strategy received an overhaul and the International Affairs Committee (IAC) was restructured to better align with SfN goals. The PDC and IAC chairs were invited to Summer Council 2009, at which Council created the Professional Development Working Group (PDWG).

PDWG and Proceedings
The PDWG is co-chaired by Councilors Frances Jensen and Joanne Berger-Sweeney and includes committee chairs Jill Becker and Anne Etgen (Professional Development Committee), Carol Barnes (International Affairs Committee), David Riddle (Committee on Neuroscience Departments and Programs), and Elisabeth Van Bockstaele (Membership and Chapters Committee). Council approved the PDWG mandate (see attached) in October 2009, when the PDWG first convened.

The PDWG held monthly conference calls from December to May 2010 and a day-long planning session in June to assemble the draft PD plan. Throughout March, the various committees represented on the PDWG held their spring meetings and discussed related strategic issues, creating synergy with the PDWG and informing discussions about PD priorities in both directions.

Early on, the PDWG identified and discussed the needs of each of SfN's key constituencies – students, non-academics, international members, women, underrepresented minorities, mid- to late-career scientists – and brainstormed ideas for the short and longer terms. For the short-term, the group focused on workshop ideas for implementation at this year's annual meeting. The result is a strong line-up of 11 workshops, many on topics never offered at the annual meeting before, such as funding career transitions and meeting orientation for first-time attendees. The PDWG also reviewed the current slate of SfN's PD activities and reaffirmed their value, while in some cases recommending adjustments.

II. PROPOSED PROFESSIONAL DEVELOPMENT PLAN

Overview
The overall goal of the proposed PD plan is to facilitate the learning and career development of neuroscientists and of SfN members in particular. As stated in the SfN Strategic Plan (see attached), "…changing demographics and evolving professional and career development needs of members offer opportunities for SfN to build upon the achievements of the Committee on Diversity in Neuroscience

and Committee on Women in Neuroscience in designing strategic, integrated, cohesive, and enhanced efforts that serve the full range of neuroscientists throughout their careers."

The PDWG has crafted an initial PD strategic plan for the next three to four years, with the following key principles in mind:

- Identifying and addressing the needs across *all* career stages and reflecting the full range of career options for neuroscientists;
- Broadening the venues at which SfN offers professional development opportunities to balance annual meeting activities with outside annual meeting;
- Applying Internet tools and technologies for cost-effectively reaching the widest possible audience;
- Leveraging collaboration with existing and potential new partners; and
- Maintaining a sustainable pricing strategy.

The plan focuses on recommendations for easily achievable, lower-cost, and shorter-term strategies. The PDWG filtered its initial ideas to highlight higher-priority items having potential for broadest impact and requiring relatively lower level of resources. Additional priorities for future consideration were also identified. While some of what is in the plan for the near-term does not require large amounts of new funding, in order to fully implement longer-term initiatives and ideas that are in the research or development phases, significant new resources will be required.

The first section below describes the needs and strategies related to each of the identified constituencies. That is followed by recommended priorities organized by programmatic objectives: a) needs assessments, b) mentoring, c) scientific knowledge building, d) professional/career skills development, e) career development resources and opportunities, f) promoting diversity in neuroscience, and g) member engagement and leadership development. The remaining sections address pricing strategies, implementation timeline, partnerships, monitoring and evaluation, and next steps.

A. **Constituencies**

In drafting SfN's new professional development plan, the PDWG defined seven major constituencies that represent the diverse membership served by SfN. These constituencies reflect different career stages (e.g., students, mid- and late-career neuroscientists) as well as various demographics, such as women and underrepresented minorities (URMs), with some overlap among the groups. The seven member constituencies whose needs and demands informed and are reflected in the plan are:

1) Undergraduate and graduate students: in 2009, 27% of SfN's members were undergraduate or graduate students. Students have been the fastest-growing segment of SfN membership.
2) Postdocs and junior faculty: in 2009, 10% of SfN members were in the postdoc category (a new membership category introduced in 2008); in the 2007 membership survey, 21% of respondents said they were in a postdoctoral program. As for junior faculty, the only indirect data is from the 2007 survey, in which 37% of respondents were 26-35 years old, 26% were 36-45 years old, and 50% indicated having less than 10 years of professional experience.
3) Mid-to-late-career scientists: again, while data does not exist for this constituency, the 2007 membership survey showed 22% of respondents have 11-20 years of professional experience and 23% have 20+ years of experience; in addition, SfN has approximately 900 emeritus members.
4) Non-academics: according to the 2007 membership survey, approximately 20% of respondents indicated they work outside of academia.

5) International: in 2009, non-US residents comprised 37% of SfN members.
6) Underrepresented minorities (URMs): SfN does not have data on race/ethnicity of members, but estimates based on the 2007 member survey indicate 6% URM members.
7) Women: as with URMs, SfN does not routinely collect gender data on members, but survey results indicated 43% women among SfN members.

- **Undergraduate & Graduate Students:** In order to support the next generation of students entering the neuroscience profession, undergraduate and graduate students need to be armed with as much information as possible to make the best decisions. The PDWG plan proposes that SfN build and continually update a Web-based career center and become *the* source of information about (a) education and training leading to degrees in neuroscience, (b) the profession of neuroscience, and (c) careers for neuroscientists within and outside of academia. The PDWG has identified year-round mentoring as another priority need of students, particularly at the graduate level. Also of importance to graduate students is information about postdoctoral positions and other jobs in neuroscience. SfN plans to develop an online career center in the coming year that will offer job search functions as well as information and resources to assist with other aspects of career networking and development. Students will also benefit from additional training in professional and technical skills that will be provided both during and outside the annual meeting. Finally, the PDWG proposes to add a new category of travel awards for undergraduates to recognize outstanding abstract submitters and to encourage the students' continuation in neuroscience. The plan recommends giving 10 awards per year at $500 each, with the possible requirement that mentors provide matching funds.

- **Postdocs and Junior Faculty:** As young neuroscientists move into postdoc and junior faculty positions, SfN's goal is to assist their acceleration into becoming established professionals in the field. To that end, SfN will provide this constituency with resources related to research funding, access to mentoring, and workshops for building professional, technical, and work/life balancing skills. Access to these resources will be available at SfN's annual meeting, on the SfN Web site, and through SfN chapters. The plan also proposes to better communicate opportunities for career development through engagement in SfN governance as a way for this group to gain leadership experience while also gaining a greater voice within SfN. (Care would be taken to do this without unduly distracting younger scientists from other aspects of their scientific career development.) In order to help SfN better understand the needs of this group, the PDWG proposes to conduct needs assessment activities that will help guide development of additional targeted programs and activities.

- **Mid-to-Late-Career Scientists:** The PDWG acknowledges the need for more information about how SfN can best serve this constituency and recommends using both the next membership survey (2011) as well as more in-depth inquiry through focus groups, etc., to gather data. In the meantime, neuroscientists in these career stages will continue to benefit from various PD work-shops and events at the annual meeting and regionally through chapters. The plan recognizes that this constituency can benefit from building professional profiles outside their home institutions. The plan thus recommends a concerted effort to enlarge the pool of volunteers from this constituency that participates in SfN, NIH study sections, editorial boards, etc., and to provide training on conducting local advocacy on behalf of neuroscience. In addition to engaging a greater number of members in this cohort, the plan calls for creating low-cost mechanisms for recognizing their and other volunteer contributions.

- **Non-Academics:** As the field of neuroscience continues to expand, more neuroscientists are engaged in and/or seeking careers outside of academia. The PDWG sees this as an increasingly

important constituency whose needs should be served by SfN – both those currently working outside academia and those interested in transitioning into the full range of professions for neuroscience trainees. To better understand this constituency's needs, the PDWG recommends further data collection and needs assessment for this constituency. Meanwhile, the PDWG proposes developing informal learning opportunities and activities such as mentoring and networking at the annual meeting in which this constituency can participate and stay engaged with other members of the profession. Also, the plan includes continued professional development workshops to support career transitions and devoting a significant part of the Web-based career center's resources and information to address careers outside academia.

- **International Members:** International members are one of the fastest-growing constituencies within SfN. The PDWG recognizes that these members need more focused communication from SfN, increased programming, and greater opportunities to become engaged outside the annual meeting. Priority needs identified for this group include training on global standards for scientific ethics, other professional development activities at international meetings, and engagement locally through chapters. Electronic communications, online mentoring, and Web-based seminars, etc., will be of particular value to international members as these resources can be easily accessed from their home countries. Also, the plan recommends targeting international senior members (many of whom are forced to retire in their early-60's) to help them remain actively engaged in the profession by recruiting them for SfN's professional development and other programming. International members are expected to also benefit from the continued and growing SfN collaboration with national, regional and international neuroscience societies.

- **Underrepresented minorities (URMs):** Diversity within neuroscience and scientific disciplines in general is an important issue facing the U.S. One of the key priorities is addressing the "leaky pipeline" – the phenomenon of URM numbers decreasing steadily at critical career transition points. The plan includes support for all of SfN's ongoing and newly approved programs aimed at retaining URMs in the profession and, ideally, increasing their numbers. This includes SfN's new IWiN project (described below) aimed at increasing women in the higher rankings of academic neuroscience. The proposed expanded mentoring program will also be an important resource benefitting this constituency. The plan calls for a more systematic and concerted effort to increase the diversity of SfN leadership and the visibility of successful URM scientists throughout SfN activities.

- **Women:** As in the case of URMs, women in neuroscience are also susceptible to the "leaky pipeline" phenomenon. SfN's new NSF-funded IWiN project, which addresses this issue, is in its first year and will continue through 2012. The project offers training for neuroscience-related department chairs on strategies for recruiting, promoting and creating a favorable work climate for women faculty and faculty from diverse backgrounds. The PD plan reflects continued support for activities at the SfN annual meeting aimed at supporting advancement of women and plugging the leaky pipeline across all career stages, such as the CWiN luncheon, mentoring event, and travel award poster session. In addition, SfN's new online and expanded mentoring program, along with greater career-related resources online, will also heavily target and benefit this constituency.

B. Priority Programs and Activities

Based on the priority needs of each of the constituencies examined, the PDWG identified programs and activities that would have the greatest potential for impact. The plan calls for SfN to enhance existing programs, and in some cases, develop new programs to fill gaps in the needs and demands

of SfN member constituencies. Below are the main programmatic areas of focus that emerged. (See attached prioritization table for details.)

- **Needs assessments**
  The PDWG recognizes that SfN currently offers relatively few professional development opportunities specifically aimed at postdoctoral trainees, non-academic neuroscientists, and mid-to-late-career neuroscientists. In order to help identify professional development priorities for these groups, the PDWG recommends conducting needs assessments among each of these constituencies. While some questions can be incorporated into a general membership survey, more focused and in-depth inquiry through focus groups will also be necessary. After analysis of the collected data, the PDWG would develop and propose a more comprehensive program of professional development for these groups.

- **Mentoring**
  Mentoring has consistently been identified as a high-priority need for many of SfN's constituencies, as reflected in Council's prior approval for an online mentor-matching program. SfN will launch the *Higher Logic*-based software in the summer of 2010, providing members with an easy-to-use and year-round mentoring program. With the capability to allow mentors to register profiles and mentees to search using keywords, the program will greatly expand opportunities for neuroscientists at all levels to connect with others for a multitude of purposes. Mentor-matching will be just one element of an expanded mentoring program. As the program rolls out, we expect to build a robust set of mentoring-related resources online. These could include, for example, profiles of successful mentoring relationships, tips on effective mentoring, podcasts on mentoring topics, etc. Collection and analysis of data captured from the program (participation levels, interactions, feedback from users, etc.) will allow us to track, evaluate and plan for improvements to SfN's mentoring program.

  The PDWG also supports enhancing the existing mentoring events at the annual meeting, as is planned this year with "mentoring topic tables." The PDWG also proposes to create a training program on effective mentoring. These workshops could be delivered both at the annual meeting (a pilot workshop is planned for this year) and locally through SfN chapters (see Professional/Career Skills Development section below for a description of chapter grants for PD workshops).

  The PDWG further identified a specific need for postdocs and junior faculty to receive guidance and resources related to researching and writing grant proposals. The plan thus proposes to use the mechanisms described above (online interactions and workshops) to mentor young researchers in this area to help increase their success in receiving grant funding.

- **Scientific Knowledge Building**
  As the premier learning event for neuroscientists in the world, SfN's annual meeting offers numerous opportunities for neuroscientists to share and build knowledge. Specific PD activities offering technical content include the one-day Neurobiology of Disease Workshop (NDW) and three day-long Short Courses, all of which are consistently well-attended events that receive strong evaluations. The Meet-the-Expert series held on Saturday mornings is also popular and should be continued. The challenge with the NDW and Short Courses is to ensure that costs are kept affordable for attendees (Meet-the-Expert is a free event) while making them revenue neutral for SfN. There are possibilities that can be explored for putting some of this content online and charging a fee for non-meeting attendees or to use the capabilities of SfN's new social networking software to enable post-meeting discussions around scientific topics covered in the courses and workshops.

In addition to the annual meeting events, SfN selectively supports technical training activities mainly aimed at international members. These include the Miledi Neuroscience Training Program for Latin American & Caribbean trainees (funded by The Grass Foundation through 2012), and the FENS-IBRO-SfN joint European Schools (SfN funding committed through 2012).

- *Professional/Career Skills Development*
  The Plan includes continued support for professional and career skills development through a variety of mechanisms and venues, targeting all constituencies across the full spectrum of career stages. The PDWG reaffirmed the importance and value of offering an array of professional and career skills building workshops at the annual meeting. For Neuroscience 2010, the PDWG has planned a series of 11 workshops, many on new topics never offered before – e.g., navigating the SfN meeting, funding career transitions, and essential skills for mentoring relationships. A calculated effort was made to cover issues of interest to a broad range of constituencies. The PDWG recommends that future workshops be similarly organized by the cluster of committees represented on the PDWG to ensure continued breadth of scope.

  A priority identified for future PD workshops is to offer established neuroscientists an opportunity to enhance their professional profiles outside their home institutions by linking them with journal editors and funding agency representatives who can recruit them for editorial boards and study sections.

  In order to expand the reach of SfN's professional skills development programming beyond the annual meeting, the PDWG proposes two mechanisms: 1) a grants program for chapters to compete for funding to conduct professional development workshops locally (pilot 3-year program at $40,000/year to fund at least 10 chapters/year); and 2) repurposing annual meeting PD workshops by putting selective content online, initially in the form of slide presentations and eventually pilot testing Web seminars (webinars).

  The plan also prioritizes support for neuroscientists transitioning into non-academic careers. This will be done both through workshops at the annual meeting, partnering with AAAS's program on careers outside academia, and developing a comprehensive set of online resources related to facilitating successful transition into a broad range of neuroscience careers.

  As mentioned in the PDWG mandate, the PD plan includes building on the work of SfN's Responsible Conduct Working Group to provide training and resources related to ethics in scientific research. This is a particularly urgent problem for the international scientific community and the PDWG has prioritized the dissemination of global standards for ethical conduct in science by collaborating with national and international societies. This effort can then serve as a model for other joint SfN-national/regional societies collaborations to deliver professional development workshops to our members at international venues.

  Lastly, the plan includes development of an advocacy training program aimed mainly at mid-to-late-career neuroscientists to enable them to support SfN's advocacy goals while building their professional profiles and skills. Support would be sought from SfN's Government & Public Affairs Committee to deliver this training either through SfN chapters and/or at the annual meeting.

- *Career Development Resources and Opportunities*
  Neuroscience trainees and those in the early years of their careers need access to a range of information and resources that can help them make career choices that support their success in

the field. Much of this can be offered online. In addition, opportunities for recognition via travel awards are important to career development for this cohort.

NeuroJobs, SfN's job resource, is currently limited as a basic job bank. The plan calls for expansion of both the online component and related activities at the annual meeting to go beyond simply providing interview booths and computers for job seekers to access the Neuro-Jobs Web site. Since most attendees have laptops and can easily access NeuroJobs from any location, the plan proposes to redirect funds currently used for computer workstations toward other activities, such as a job fair (starting in 2011). The plan also calls for an expanded online career resource center that incorporates a more robust job bank along with resources for preparing resumes and other materials that support the job seeker and career development. To support and facilitate the search for research funding opportunities, identified as a critical need particularly for postdocs and junior faculty, the PDWG proposes creating a Web-based repository of funding information and resources with links and references.

In addition to continuing to provide the various merit-based travel awards to the SfN meeting for outstanding graduate students and postdocs, the PDWG recommends creating a small travel award program for undergraduates. The PDWG acknowledges this would be a relatively low-impact activity (10 awards/year at $500 each), but considers it a low-cost way to generate goodwill within this cohort of SfN members. These awards could be managed through CNDP (with a possible link to SfN's Institutional Program membership), just as the PDC and MCC currently manage the other two travel award programs.

- ***Promoting Diversity in Neuroscience***
  SfN supports diversity in neuroscience through a range of programs aimed at enhancing gender and racial/ethnic diversity. SfN's two main grant-funded programs are in this area – 1) the Neuroscience Scholars Program (NSP), funded by NINDS through 2014), that supports about 50 URM trainees each year, and 2) the IWiN project (an ADVANCE/PAID grant from NSF funded through 2012) on *Department Chair Training to Increase Women in Neuroscience.* The PD plan reflects continued support for these grant programs, as well as the numerous activities at the annual meeting targeting these constituencies – the Diversity Poster Session, NSP Mentor-Fellow Breakfast, Celebrating Women in Neuroscience Luncheon, etc.

  The plan also includes two recently approved initiatives targeting URMs – a pilot project for grant proposal coaching/mock reviews (SfN received NSP supplemental funding from NINDS) and a new initiative to support neuroscience poster presentation awards at the Annual Biomedical Research Conference for Minority Students. The plan further calls for a more systematic and concerted effort to increase the diversity of SfN leadership and visibility of successful URM scientists throughout SfN programs and activities.

  In addition, as mentoring was identified as a high priority for women and URMs, these groups are expected to benefit from the expanded capabilities of SfN's online mentoring program and related mentoring activities.

- ***Member Engagement and Leadership Development***
  The PDWG recognizes that engagement in SfN and participation in leadership positions provide unique opportunities for members to contribute to the mission of their professional society, develop leadership skills, and gain recognition by peers. SfN can do more to increase the pool of members interested in serving on committees, participating in mentoring, and contributing to the array of SfN programs and activities. For SfN's younger members, in order to provide

opportunities for them to develop leadership skills as well as to have a voice in the organization, the PDWG recommends the Committee on Committees be charged with assessing the feasibility of and possible mechanisms for <u>systematically engaging junior members</u> (students, postdocs, early-career) in SfN's governance structure. On the other end of the spectrum, the plan proposes to encourage and recruit a broader pool of <u>senior and emeritus members and former SfN leaders and committee members</u> for mentoring and other SfN programs and for service on committees and editorial boards. The PDWG also recommends that SfN develop a more robust and consistent SfN <u>volunteer recognition program</u> which can be implemented at a relatively low cost.

<u>Preview of future programming needs</u>
In addition to the relatively high-impact and low-resource programs and activities included in the initial phases of the proposed plan, the PDWG identified many more ideas for the PD programming pipeline. While many of the plan's near-term programs and activities do not require large amounts of funding and other resources, the more ambitious set of activities beyond FY12 will require significant new resources to fully implement. Longer-term initiatives and ideas, including those that are in the research and development phases and those involving expansion of Web-based and international programs, are likely to be more costly and labor-intensive. These ideas will be brought forward in subsequent years for prioritization, as funding is identified and needs and progress are reassessed.

C. **Pricing Strategy Recommendations**

The PDWG was mindful of Council discussions regarding SfN's business model and the importance, as member needs continue to grow, of finding ways to balance expenses and revenues. Currently, all of SfN's PD activities are offered free-of-charge to members, with the exception of the Neurobiology of Disease Workshop and Short Courses at the annual meeting (these are in part subsidized by SfN and/or funders).

The PDWG recommends that the business model for pricing of professional development under the plan be pursued according to the following principles:
- Provide opportunities for free or at the lowest fees to student members and postdocs.
- Affirm our commitment to the professional development of SfN <u>members</u> by keeping the cost of programs at a revenue-neutral model to the extent possible.
    - Day-long events, whether at or outside the annual meeting (e.g., Short Courses) should be revenue-neutral.
- Professional development workshops at the annual meeting should continue to be free to meeting attendees (i.e., included in the annual meeting registration fee).
- When annual meeting PD content is available online, non-meeting attendees should pay to access the content.
- Affirm SfN's commitment to the scientific community by making SfN professional development programs available to all (including non-members) at a reasonable and appropriate pricing schedule.

The PDWG recommends SfN leadership (Council and committees) play a more proactive role in helping to seek external funds for professional development through grants and sponsorships. Another suggestion is to consider including a check-box on the SfN membership renewal form to donate to a special fund for professional development (such as the "Friends of SfN Fund").
In addition to generating revenue directly from professional development workshops and events, the PDWG supports generating increased advertising revenue by offering more opportunities for

other organizations to advertise through SfN communication vehicles and Web pages such as the NeuroJobs site.

D. Implementation Timeline

The Working Group strategized implementation of the PD plan across a four-year timeframe, including the current fiscal year that began July 1, 2010. The attached prioritization table shows proposed implementation in 6-month increments, with the first six-month period (July-Dec. 2010) mainly focused on existing and pre-approved activities that are already budgeted for this year, such as the online mentor-matching program. The timeline provides an initial rough overview and is meant to be further refined as programming details are developed following Council input.

Due to its importance in helping define future professional development activities, the needs assessment for the postdocs/junior faculty, non-academics, and mid-to-late-career constituencies should be undertaken as soon as possible. This can be done at little to no additional cost via focus group discussions and incorporating questions into an overall membership survey that is planned for 2011. Based on the results, the PDWG will discuss next steps and propose additional programming for these constituencies, as needed.

Many new activities are proposed to get underway beginning in mid-2011, to allow for inclusion in the FY12 budget and for seeking external funding where needed. The PDWG made an effort with the initial plan efforts to focus on high-priority products, services and activities that have the broadest potential for impact on members, require relatively little or no financial investment, and are feasible with existing staff resources. As the plan gains momentum in 2012, additional resources will be needed to implement plan activities. In subsequent years, SfN members can expect to see an increase in mentoring program resources, the launch of Web seminars and Podcasts, and greater opportunities for networking and professional development outside the annual meetings. Robust implementation of these initiatives will require increased staff resources beyond that currently programmed.

E. Key Partners/Potential Partnerships

The PDWG mandate called for consideration of partnerships to help implement new PD activities – including working with and through SfN chapters, leveraging collaboration with SfN's Institutional Program (IP) members, partnering with like-minded associations, and establishing new avenues of collaboration with international societies and organizations. The proposed plan recommends taking full advantage of each of these as outlined below.

- *Chapters:* There exists a large reserve of potential partners within SfN's network of more than 140 chapters around the world. Leveraging chapters to help SfN deliver PD programming at a grassroots level is considered a cost-effective mechanism, particularly if cost-sharing with local resources is encouraged and/or required. Therefore, the plan includes expanding funding for chapter grants specifically earmarked for mentoring-related and other professional development activities at a local level. The PDWG recommends a three-year pilot chapter grant program, funded at $40,000/year. Specific guidelines would be developed, but the initial idea is to award chapters up to $4,000 each, with a requirement of a certain percent in matching funds.

- *IP members:* Neuroscience departments and programs, responsible for the training of new generations of neuroscientists, can help SfN achieve its PD goals. Through CNDP, the plan envisions engaging SfN's IP members to help disseminate information and promote engagement in PD activities.

- ***National societies, international and regional organizations:*** In order to better serve its international members, SfN has been partnering with national societies (e.g., Canada, Mexico, Japan), is exploring new collaborations (China and Britain), and continues joint efforts with FENS and IBRO. Through improved bilateral relationships with an increasing array of national and regional societies, SfN can leverage their strengths and deliver greater value to its international members. One of the key areas identified by the PDWG as a high priority and ripe for intervention is disseminating global standards for responsible conduct and ethics in scientific research. The plan proposes to devise strategies for providing training in this area in collaboration with international, regional, and national organizations.

- ***Related organizations:*** In order to maximize resources and avoid duplication of efforts, the plan calls for strengthening and/or establishing relationships with organizations such as the Faculty for Undergraduate Neuroscience (FUN), National Postdoctoral Association (NPA), Association of Women in Science (AWIS), and the American Association for the Advancement of Science (AAAS) – all of which are likely partners for PD programming. For example, the NPA might be able to assist SfN with the postdoc needs assessment. In the case of AAAS, they have an excellent set of resources related to science careers outside academia and opportunities exist to tap into their program of free regional workshops on this topic, linking them up with SfN's chapters.

F. Monitoring and Evaluation Strategy and Framework

SfN staff will work with the PDWG to create a comprehensive and rigorous monitoring and evaluation (M&E) framework for the PD programs and activities proposed in this plan, building on existing assessment efforts. The framework will provide an ongoing understanding of the PD needs of members, the various programs' performance, optimal use of resources, and achievement of outcomes. This information will be used to inform SfN decision-makers and key stakeholders on an ongoing basis. It will also be an important tool to help strengthen applications for external funding.

As the M&E framework and plan are being developed, we anticipate using a range of M&E tools, appropriate to each program or activity and results being measured. A robust data collection process will be used to track and analyze progress including, e.g., a database with metrics on participants in SfN's PD activities that will be linked to SfN's member database. In the case of ongoing grant-funded programs such as the NSP and IWiN, each has its own built-in evaluation plan that will be executed as specified in the respective funding proposal. These results will then be linked to the broader SfN results framework to determine achievement of outcomes and lessons learned across all of SfN's PD programs.

For activities occurring at the annual meeting, SfN will continue and enhance the basic monitoring and evaluation of offerings. By using badge scanning machines (new in 2010), we will begin to track more accurately participation in the various events. Post-event surveys will be used more consistently to measure participants' satisfaction, including the quality and effectiveness of delivery, areas for improvement, and gains in knowledge where relevant. SfN will work with PD event organizers to define clear learning objectives and/or outcomes for each.

For evaluation of longer-term programs, such as the expanded mentoring program and training programs, qualitative and quantitative analysis through surveys, interviews, focus groups and outside research will be employed. Summative evaluations will capture participants' learning, professional skills, and applied activity at the end of the program cycle and seek to assess the longer-term impacts on the SfN member community. Assessment results will be reported in an

annual evaluation for professional development programs and will provide material for the annual report.

G. **Next Steps**

Taking into account feedback from Council on the direction and content of the proposed PD plan, particularly with regard to prioritization of specific strategies, programs, and potential funding, the PDWG will work with staff to make necessary revisions and to develop a more detailed implementation plan and budget (including staff and non-staff resources).

The detailed plan and budget would be presented to Council in San Diego at the fall meeting for approval. At the same time, each of the relevant SfN committees will be updated and engaged in the process during their fall meetings, as much of the specific activities will fall under one or more committee's purview. Any additional feedback would then be incorporated and reflected in SfN's FY12 budgeting process and presented to Council for approval in May 2011 for implementation starting in July. In addition to FY12 budgetary impact, the plan will include likely financial implications for future years.

In order to accomplish the above, we propose the PDWG be charged with continuing its work through the spring 2011 Council meeting, at which time the ongoing monitoring and updating of the plan would be handed over to the Membership and Professional Development Cluster, comprised of the four committees represented on the PDWG.

SFN PROFESSIONAL DEVELOPMENT STRATEGIC PLAN (2010-2014) - AUGUST 2011 STATUS

KEY ● Completed ● In Process ● Future (Budgeted/Programmed) ● Future (New Resources Would be Required)

White Rows = future activites requiring additional resources

Yellow Rows = completed, underway or already budgeted/programmed

NEEDS of Target Constituencies	SfN GOALS	PROGRAM/ ACTIVITY	Revenue/ Funding	FY11 Jul-Dec 2010	FY11 Jan-June 2011	FY12 Jul-Dec 2011	FY12 Jan-Jun 2012	FY13 Jul-Dec 2012	FY13 Jan-June 2013	FY14 Jul-Dec 2013	FY14 Jan-Jun 2014
NEEDS ASSESSMENTS: For several of SfN's constituencies that haven't been targeted previously, we should better understand their needs and how to meet them.											
Better reflect interests and support career development of **postdocs and junior faculty.**	Better understand and meet needs of postdoc and early-career members by gathering and analyzing data that will guide development of programs/activities and give them more of a voice within SfN.	Incorporate questions aimed at postdocs and junior faculty into SfN member survey and/or conduct separate surveys/focus groups to gather info.		●(orange)	●(orange)	●(orange)	●(purple)				
Neuroscientists who are in or interested in pursuing **non-academic careers** need to be more engaged in SfN.	Better understand and meet needs of neuroscientists outside academia by gathering and analyzing data that can help guide development of programs/activities and representation within SfN.	Incorporate questions related to non-academic careers into SfN member survey and conduct other research to gather information on needs of this group.		●(orange)	●(orange)	●(orange)	●(purple)				
Mid- and late-career members have needs that aren't fully understood or being met.	Provide enhanced member value by better understanding needs & desires of people in this career stage.	Incorporate questions aimed at mid- to late-career neuroscientists into SfN member survey and/or conduct separate surveys/focus groups to gather info.		●(orange)	●(orange)	●(orange)	●(purple)				
MENTORING: One-on-one and peer group mentoring is considered critical to successful scientific career development, as well as important to successful career transitions and advancement at all levels. A mentoring program is multi-dimensional and components are also built into other activities described below (such as PD workshops), but its high-priority status warrants a separate programmatic focus.											
Students and early-career neuroscientists need more opportunities to receive mentoring support outside their home institutions.	Provide opportunity for face-to-face discussions with mentors.	SfN's ongoing mentoring event at the annual meeting will offer a new format in 2010 that uses mentoring topic tables, rather than one-on-one meetings with mentors.		●(orange)		●(green)		●(purple)		●(purple)	
Undergrad and graduate students, **postdocs** and **junior faculty** need mentoring outside their home institutions.	Retain neuroscientists through academic and career challenges and transitions by providing a mentoring program to target the most frequently encountered obstacles and find solutions/methods for success.	A year-round mentoring program built around the new online mentor-matching software (HigherLogic) and related online resources. (initial program launch - Sept. 2010)		●(orange)	●(orange)	●(green)	●(green)	●(purple)	●(purple)	●(purple)	●(purple)
Postdocs, junior faculty, and **mid-to-late-career** members need opportunities and training to be effective mentors.	Increase the pool of high-quality mentors and broaden opportunities for more SfN members to engage in mentoring program.	Create a program to train mentors to be offered as a workshop at the annual meeting, and maintain online resources for their continued growth .		●(orange)	●(orange)	●(green)	●(green)	●(purple)	●(purple)	●(purple)	●(purple)

				STATUS							
				FY11		FY12		FY13		FY14	
NEEDS of Target Constituencies	SfN GOALS	PROGRAM/ ACTIVITY	Revenue / Funding	Jul - Dec 2010	Jan - June 2011	Jul - Dec 2011	Jan - Jun 2012	Jul - Dec 2012	Jan - June 2013	Jul - Dec 2013	Jan - Jun 2014
Postdocs and junior faculty need guidance and resources for research funding.	Keep young research scientists funded by providing group mentoring and guidance for researching and writing grants.	Create a mentoring program to assist young scientists in writing proposals for grants and offer annual meeting activities to support it, along with other workshops and mentoring via Higher Logic software.				(green)	(lavender)	(purple)	(purple)	(purple)	(purple)
Eliminate the challenges of the leaky pipeline for **women** and **URMs** across all career stages.	Increase the number of women and URM neuroscientists at all levels by providing them with mentoring.	Target women and URM neuroscientists to participate in SfN's expanding mentoring program.		(orange)	(orange)	(green)	(green)	(lavender)	(lavender)	(lavender)	(lavender)
SCIENTIFIC KNOWLEDGE BUILDING: Much of what SfN can offer in this area is provided via the annual meeting program content, including short courses, NDW and Meet-the-Expert sessions. Target groups are mainly students, postdocs and junior faculty, although all career levels participate. SfN selectively supports technical training activities mainly aimed at serving int'l members.											
Postdocs and junior faculty need continuing education on topics related to scientific research on diseases of nervous system.	Provide young neuroscientists with in-depth exposure to diseases of nervous system.	Neurobiology of Disease Workshop (NDW) held pre-annual meeting is funded by NINDS and awaiting grant renewal for 2011-2015. Charge a nominal registration fee.	$	(orange)		(green)		(lavender)		(lavender)	
All career levels need continuing education and knowledge on specific technical research topics.	Support the continuous education and knowledge building of the SfN membership.	Offer a variety of short courses (one-day) as pre-annual meeting events at the rate of three per year. Charge registration fee.	$	(orange)		(green)		(lavender)		(lavender)	
International students/postdocs need access to in-depth training on specific research topics.	Contribute to the training of outstanding young neuroscientists in developing countries.	Miledi Training Program: annual 4-wk course for LatAm&Caribbean trainees (funding from Grass Foundations through 2012)	$	(orange)	(orange)		(green)		(purple)		(purple)
All students (including international students) need to be better served with more opportunities to receive training outside their home institutions.	Meet needs of SfN's increasing international student membership by collaborating with FENS to provide opportunities in Europe for students to receive intensive training on selected topics.	FENS/IBRO/SfN European Schools: SfN contributes 50 Euros/year for one joint school/yr. (current commitment thru 2012)			(orange)		(green)		(purple)		(purple)
All students need access to continuing education.	Provide opportunities for neuroscience students to interact with experienced neuroscientists in small-group settings.	Meet-the-Expert sessions at AM: typically 8-10/year; free to attendees; some sponsorship funding.	$	(orange)		(green)		(lavender)		(lavender)	
PROFESSIONAL/CAREER SKILLS DEVELOPMENT: Workshops and other activities that will enhance and develop skills to advance careers; target groups are ALL constituencies across career stages; includes offerings at annual meeting, regional/int'l, and online.											
Postdocs and junior faculty need professional development workshops focused on topics both career and personal in nature.	Retain neuroscientists through life challenges by providing a mentoring program to target the most frequently encountered obstacles and find solutions/methods for success. Keep young research scientists funded by group mentoring for the topics of research and writing grants.	Offer professional development workshops at the annual meeting on topics including work/life balance and securing research funding.		(orange)		(green)		(lavender)		(lavender)	

NEEDS of Target Constituencies	SfN GOALS	PROGRAM/ ACTIVITY	Revenue/ Funding	STATUS							
				FY11		FY12		FY13		FY14	
				Jul - Dec 2010	Jan - June 2011	Jul - Dec 2011	Jan - Jun 2012	Jul - Dec 2012	Jan - June 2013	Jul - Dec 2013	Jan - Jun 2014
Graduate students, postdocs, URMs, and international students need career development.	Provide forum where younger neuroscientists can practice presenting posters, get feedback in more focused and smaller settings, and network with like-minded groups.	Poster sessions at the annual meeting: int'l fellows, diversity trainees, and travel award winners *[new for Travel Award recipients]*	$	orange		green		light purple		light purple	
Some **postdocs, junior faculty and mid-career faculty** need more teaching resources.	Build capacity of neuroscience professionals in developing countries to teach neuroscience.	Africa Teaching Tools Workshop: SfN provides $50K/year to IBRO; current commitment thru 2012. [Note: Council approved 1-year extension]		orange		green		light purple		dark purple	
Non-academic neuroscientists need to improve their transitions into other neuroscience professions.	Address issues to ensure success for non-academic neuroscientists experiencing career transitions.	Provide professional development workshops to support career transitions at the annual meetings, regional and chapter events, collaborations with other scientific societies and through resources on the Web.		orange		green	light purple / dark purple	light purple / dark purple	light purple / dark purple	light purple / dark purple	light purple / dark purple
All career levels need professional and career development training.	Assist chapters to ensure delivery of professional development and mentoring workshops at the local and regional levels.	Create chapter grants for competitive applications to conduct professional development and mentoring workshops locally. Require matching funds. Make available resources from PDWs held at AM. ($24,000) [Note: Council approved $ for FY12]				green	light purple	light purple	light purple	light purple	light purple
All career levels need a global standard for scientific ethics.	Coordinate/collaborate with international groups to disseminate SfN's guidelines for responsible conduct and best ethical practices.	Identify international societies to disseminate ethical standards and devise strategies to provide training through SfN international chapters, other national societies and regional organizations (e.g., FENS, IBRO).			orange	green	light purple	dark purple	dark purple	dark purple	dark purple
Mid and late-career members need to build professional profiles outside home institution, at the organizational, national/ international levels.	Engage and train more members in advocacy by developing local advocates.	Provide advocacy training by SfN consultants at chapters/national meetings facilitated by Government & Public Affairs department.						dark purple	dark purple	dark purple	dark purple
Mid and late career members need to build professional profiles outside home institution, at the organizational, national/ international levels.	Recruit mid-late career members into committee work, study sections and onto editorial boards.	Offer focused workshop with SfN, journal, and funding agency representatives at the annual meeting.		orange		green		light purple		light purple	
CAREER DEVELOPMENT RESOURCES AND OPPORTUNITIES: Neuroscience trainees and those in the early years of their careers need access to a range of information and resources that can help them make career choices and support their success in the field. Much of this can be offered online. In addition, opportunities for recognition via travel awards are important to career development for this cohort.											
All career levels need to secure positions in the field of neuroscience.	Provide online job bank accessible to all job seekers that will generate revenue through employer job postings.	NeuroJobs: online and at annual meeting (consider expanding annual meeting activity to structured job fair).	$	orange	orange	green	green	light purple	light purple	light purple	light purple
Graduate students and postdocs need career development and recognition.	Recognize and reward meritorious work submitted as abstracts by graduate students and postdocs.	Continue the Travel Award programs through chapters, the Professional Development Committee, and IBRO.	$	orange		green		light purple		light purple	

NEEDS of Target Constituencies	SfN GOALS	PROGRAM/ ACTIVITY	Revenue/ Funding/	STATUS							
				FY11		**FY12**		**FY13**		**FY14**	
				Jul - Dec 2010	Jan - June 2011	Jul - Dec 2011	Jan - Jun 2012	Jul - Dec 2012	Jan - June 2013	Jul - Dec 2013	Jan - Jun 2014
Graduate students need international experience, career development and recognition.	Encourage international networking by supporting North American graduate students' and postdocs' participation in international conferences.	Continue the Travel Awards for North American graduate students to attend FENS & IBRO meetings (15 awards each).		orange (FENS)		orange (IBRO)		light purple (FENS)			
Undergrads, graduate students, and postdocs need to remain in the field of neuroscience.	Grow the profession by providing information and resources about career options within neuroscience, and tools and resources related to careers in neuroscience.	Create a robust online career center that incorporates a job bank, career-related info, professional development, links to online seminars and training, tools, and resources.		green	green	purple	purple	purple	purple		
Postdocs and junior faculty need research funding.	Provide the membership with information related to neuroscience funding opportunities.	Create and maintain a Web-based repository of funding information and resources with links and references.				green	green	light purple	light purple	light purple	light purple
Undergraduate students need recognition and professional development.	Recognize outstanding abstract submissions by undergraduates to encourage continuing interest in the field.	Create a new Travel Award program for undergraduates, with possible link to chapters and/or to IP members. $500 x 10 awards/year. [Note: Council approved 7 awards @ $750]				orange		light purple		light purple	
PROMOTING DIVERSITY IN NEUROSCIENCE: Bringing together and increasing participation of scientists of diverse backgrounds is a core element of SfN's mission. Diversity in neuroscience is adversely affected by inadequate numbers of women and minorities entering the field and career development outcomes that are not proportional to the mix of genders and ethnicities in the field. SfN has several grant-funded programs and other activities specifically addressing gender and minority issues, but more can be done to increase diversity within SfN's leadership and governance structures, its membership, and its professional development activities. (In addition to items listed below, mentoring and other PD activities listed above also play a key role in supporting SfN's diversity goals.											
Women and URMs need to overcome the challenge of the "leaky" pipeline in order to move into higher academia.	Increase diversity of academia at all levels and improve the working climate for women and URMs.	Support the Increasing Women in Neuroscience (IWiN) project. Funded by NSF (2009-2012).	$	orange	orange	green	green	light purple	purple	purple	purple
URMs need to meet the challenge of the "leaky" pipeline in neuroscience.	Provide fellowships to highly qualified URM trainees.	Continue the Neuroscience Scholars Program (NSP), awarding three-year fellowships to URMs. NSP is funded by a NINDS grant (2009-2014).	$	orange	orange	green	green	light purple	light purple	light purple	light purple
	Provide opportunities for URM trainees to present posters and network in smaller venues at SfN meetings.	Continue to support the Diversity Poster Session & Diversity Reception at annual meeting.		orange		green		light purple		light purple	
	Offer face-to-face individual and group mentoring opportunities for URM trainees at annual meetings.	Continue to support the Mentor-Scholar Breakfast (NSP) at annual meeting.		orange		green		light purple		light purple	
URMs need to improve the rate at which they receive grant funding.	Increase diversity of NIH/NSF grant-funded investigators by providing mentoring and coaching for proposal preparation.	Implement pilot project on intensive coaching & mock reviews for URMs submitting grant proposals to NIH/NSF (NINDS funding for 1st year).	$	orange	orange	green	green				
Women neuroscientists need to receive awards in numbers commensurate with their representation w/in the field.	Ensure SfN's awards nomination and selection processes foster gender equity and reflect best practices.	Participate in the two-year AWIS/AWARDS Project (NSF grant to AWIS), a working group of CoC members that recommend actions for SfN to implement.	$	orange	orange	green	green				

| NEEDS of Target Constituencies | SfN GOALS | PROGRAM/ ACTIVITY | Revenue/ Funding | STATUS | | | | | | | |
| | | | | FY11 | | FY12 | | FY13 | | FY14 | |
				Jul - Dec 2010	Jan - June 2011	Jul - Dec 2011	Jan - Jun 2012	Jul - Dec 2012	Jan - June 2013	Jul - Dec 2013	Jan - Jun 2014
Women neuroscientists need career development.	Increase visibility of women in neuroscience at the annual meting.	Continue to support the Celebrating Women in Neuroscience (CWiN) Luncheon at annual meeting and facilitate networking/discussions on issues of concern to women.		🟠		🟢		🟣		🟣	
The number of **URM students** in the field of neuroscience needs to be increased.	Recognize and encourage outstanding URM undergraduate neuroscience students presenting at Annual Biomedical Research Conference for Minority Students (ABRCMS) to pursue advanced training in neuroscience.	Continue to support the neuroscience poster/oral presentation awards at ABRCMS. (Council approved as pilot for 3 years.)		🟠		🟢		🟣		?	
Career development for **URMs**	Increase visibility of successful URM scientists at the annual meeting, and through activities of SfN chapters and Institutional Program (IP) members.	Develop and maintain an online community of URM neuroscientists. Offer more encouragement to URMs to submit symposium/mini-symposium proposals and work with Program Committee to track minority status and gender of annual meeting presenters.		🟠	🟠	🟢	🟢	🟣	🟣	🟣	🟣
	Increase diversity of SfN leadership by nominating more URM neuroscientists.	The Professional Development Committee will provide a list of URM nominees to the CoC on an annual basis.			🟠		🟣		🟣		🟣
MEMBER ENGAGEMENT AND LEADERSHIP DEVELOPMENT: Engagement in SfN and participation in leadership positions provide unique opportunities for SfN members to: a) contribute to the mission of their professional society, b) develop leadership skills, and c) gain recognition by peers.											
Postdocs and junior faculty need more opportunities for career development and a greater voice within SfN.	Accelerate successful establishment of younger neuroscientists by helping them gain leadership experience at regional level through chapters and participation in SfN.	Assess feasibility and possible mechanisms for engaging junior members into SfN's governance structure. Also, use this group as a resource for developing new programs. *[This links to needs assessment activity above; results of assessment can inform decisions.]*		🟠	🟠	🟢					
Mid-late, senior, and international senior members, nearing retirement, need support to sustain active engagement.	Use mid-late career neuroscientists in SfN as a resource for mentoring, and to serve on committees and editorial boards, etc. Retain past committee/Council members as volunteers for programs and activities.	Develop activities specifically aimed at engaging mid-late, senior, and senior international members. Develop recognition program for volunteers.			🟠	🟢	🟪	🟪	🟪	🟪	🟪

Institutional Program (IP) Member Types:			
U=Undergraduate (51)	G=Graduate (123)	**TOTAL = 179**	
PD=Postdoc (5)	*4 New Programs*		
ACTIVE INSTITUTIONAL PROGRAM (IP) MEMBERS			
Institution	**Program Name**	**State/Province**	**Type**
Cornell University	Behavioral and Evolutionary Neuroscience Program	NY	G
1095 NW 14th Terrace	Neuroscience Graduate Program	FL	G
Albert Einstein College of Medicine	Dominick P. Purpura Department of Neuroscience	NY	G
Amherst College	Neuroscience Program	MA	UG
Baldwin-Wallace College	Neuroscience Program	OH	UG
Baylor College of Medicine	Neuroscience Graduate Program	TX	G
Baylor University	Graduate Psychology & Neuroscience	TX	G
Baylor University	Undergraduate Psychology & Neuroscience	TX	UG
Boston University	Graduate Program For Neuroscience	MA	G
Boston University	Undergraduate Program In Neuroscience	MA	UG
Boston University School of Medicine	Program In Biomedical Neuroscience	MA	G
Brandeis University	Graduate Neuroscience Program	MA	G
Brandeis University	Undergraduate Neuroscience Program	MA	UG
Brigham Young University	Neuroscience Center	UT	UG
Brown University	Graduate Department of Neuroscience	RI	G
California State University, Long Beach	Psychology	CA	UG
Carthage College	Neuroscience Program	WI	UG
Case Western Reserve University	Department of Neurosciences	OH	G
Cedar Crest College	Neuroscience Program	PA	UG
Centenary College of Louisiana	Neuroscience Program	LA	UG
Central Michigan University	Graduate Program In Neuroscience	MI	G
Central Michigan University	Undergraduate Program In Neuroscience	MI	UG
Christopher Newport University	Neuroscience Program	VA	UG
College of Charleston	Program In Neuroscience	SC	UG
Colorado College	Neuroscience	CO	UG
Colorado State University	Molecular, Cellular & Integrative Neurosciences	CO	G
Columbia University	Postdoctoral Department of Neuroscienec	NY	PD
Columbia University	Program in Neurobiology and Behavior	NY	G
Cornell Univ:Weill Cornell Med College	Imagine:Ithaca Manhattan Graduate Initiative In Neuroscience	NY	UG
Dartmouth College	Psychological & Brain Science	NH	G
Davidson College	Neuroscience Program	NC	UG
Drew University	Neuroscience	NJ	UG
Drexel University College of Medicine	Neuroscience Program	PA	G
Duke University	Neurobiology	NC	G
Emory University	Neuroscience and Behavioral Biology	GA	UG
Emory University	Neuroscience Graduate Program	GA	G
Farber Institute of Neuroscience	Thomas Jefferson University	PA	PD
Florida Atlantic University	Center For Complex Systems & Brain Sciences	FL	G
Florida State University	Program in Neuroscience	FL	G
Franklin & Marshall College	Biological Foundations of Behavior: Neuroscience	PA	UG
George Mason University	Interdisciplinary Neuroscience Phd Program	VA	G
Georgia State University	Neuroscience Institute	GA	G
Indiana University	Program In Neuroscience	IN	G
Indiana University School of Medicine	Stark Neuroscience Research Institute	IN	G
Ithaca College	Neuroscience Minor	NY	UG
John Carroll University	Interdisciplinary Neuroscience Concentration	OH	UG
John Hopkins University School of Medicine	Training Program In Neuroscience	MD	G
Johns Hopkins University	Undergraduate Neuroscience Program	MD	UG
Lake Forest College	Neuroscience	IL	UG
Lehigh University	Biological Sciences	PA	G
Louisiana State University Health Science Ctr	Interdisciplinary Neuroscience Training Program	LA	G

Institutional Program (IP) Member Types:			
U=Undergraduate (51)	**G=Graduate (123)**	**TOTAL = 179**	
PD=Postdoc (5)	*4 New Programs*		
ACTIVE INSTITUTIONAL PROGRAM (IP) MEMBERS			
Institution	**Program Name**	**State/Province**	**Type**
Loyola University Chicago	Neuroscience Graduate Program	IL	G
LSU Health Sciences Center	Cell Biology & Anatomy	LA	G
Macalester College	Neuroscience Studies	MN	UG
Marquette University	Department of Biological Sciences	WI	G
McGill University	Behavioral Neuroscience Training Program	QUEBEC	G
McGill University	Bsc Major In Neuroscience	QUEBEC	UG
Medical College of Wisconsin	Neuroscience Doctoral Program	WI	G
Meharry Medical College	Neuroscience and Pharmacology	TN	G
Miami University	Center For Neuroscience and Behavior	OH	G
Miami University	Neuroscience Minor	OH	UG
Michigan State University	Neuroscience Program	MI	G
MIT	Post-Doc Brain and Cognitive Sciences	MA	PD
MIT	Undergraduate Brain and Cognitive Sciences	MA	UG
MIT 46-2005	Graduate Brain and Cognitive Sciences	MA	G
Mount Sinai School of Medicine	Interdisciplinary Graduate Training Program In Neuroscience	NY	G
New York University	Center For Neural Science	NY	G
New York University	Neuroscience & Physiology	NY	G
NIH/NIMH	Division of Intramural Research	MD	PD
Northeastern University	Program In Behavioral Neuroscience	MA	UG
Northwestern University	Interdepartmental Neuroscience Program	IL	G
Oberlin College	Neuroscience Department	OH	UG
Ohio State University	Neuroscience Graduate Studies Program	OH	G
Ohio University	Honors Tutorial College	OH	UG
Ohio Wesleyan University	Neuroscience Program	OH	UG
Oregon Health & Science Univeristy	Behavioral Neuroscience	OR	G
Oregon Health & Science University	Behavioral Neuroscience	OR	PD
Penn State University	Penn State Neuroscience Program	PA	G
Philadelphia College of Osteopathic Medicine	Neuroscience, Physiology and Pharmacology	PA	G
Pomona College	Neuroscience	CA	UG
Princeton University	Princeton Neuroscience Institute	NJ	G
Queens College - City University of New York	Neuroscience	NY	UG
Queen's University	Centre For Neuroscience Studies	ONTARIO	G
Regis University, D-12	Neuroscience Program	CO	UG
Rosalind Franklin University	Interdepartmental Neuroscience PhD Program	IL	G
SIU School of Medicine	Pharmacology & Neuroscience Graduate Program	IL	G
Smith College	Neuroscience Program	MA	UG
St. Mary's College of Maryland	Neurosciences Minor	MD	UG
Stanford University	Neurosciences Phd Program	CA	G
State University of New York Binghamton	Behavioral Neuroscience	NY	G
State University of New York, Binghamton University	Integrative Neuroscience	NY	UG
SUNY at Buffalo	Behavioral Neuroscience Graduate Program	NY	G
SUNY Stony Brook	Graduate Program In Neuroscience	NY	G
Temple University	Graduate Neuroscience Program	PA	G
Temple University	Undergraduate Neuroscience Program	PA	UG
Texas A&M University	Texas A&M Institute for Neuroscience	TX	G
The University of Iowa	Neuroscience Graduate Program	IA	G
The University of Miami	Neuroscience Major	FL	UG
Thomas Jefferson University	Graduate Neuroscience Program	PA	G
Trinity College	Neuroscience Program	CT	UG
Tufts	Graduate Program In Neuroscience	MA	G
Tulane University	Graduate Neuroscience Program	LA	G

Institutional Program (IP) Member Types:			
U=Undergraduate (51)	G=Graduate (123)	**TOTAL = 179**	
PD=Postdoc (5)	*4 New Programs*		
ACTIVE INSTITUTIONAL PROGRAM (IP) MEMBERS			
Institution	**Program Name**	**State/Province**	**Type**
Tulane University	Undergraduate Neuroscience Program	LA	UG
UCLA	Interdepartmental Phd Program For Neuroscience	CA	G
UCLA Department of Neurobiology	Graduate Program In Neurobiology	CA	G
UMDNJ/Rutgers University	Graduate Program In Neuroscience	NJ	G
UNC - Chapel Hill	Curriculum In Neurobiology	NC	G
UNC Chapel Hill	Behavioral Neuroscience Program - Psychology Department	NC	G
Uniformed Services Univ of Health Sci	Graduate Program In Neuroscience	MD	G
Univ Pennsylvania, Mahoney Inst of Neurol Sciences	Neuroscience Graduate Group	PA	G
Univeristy of Wisconsin-Milwaukee	Graduate Training Program In Neuroscience	WI	G
Universite De Montreal	Programme En Sciences Neurologiques	QUEBEC	G
University of Alabama	Behavioral Neuroscience Phd Program-Psychology	AL	G
University of Arizona	Graduate Interdisciplinary Program In Neuroscience	AZ	G
University of Arizona	School of Mind, Brain, and Behavior	AZ	UG
University of Arkansas For Medical Sciences	Department of Neurobiology and Developmental Sciences	AR	G
University of British Columbia	Graduate Program In Neuroscience	BRITISH COLUMBIA	G
University of California, Berkeley	Neuroscience Graduate Program	CA	G
University of California, Davis	Neuroscience Graduate Program	CA	G
University of California, Irvine	Graduate Program In Pharmacology and Toxicology	CA	G
University of Chicago	Committee On Neurobiology	IL	G
University of Cincinnati	Neuroscience Graduate Program	OH	G
University of Colorado School of Medicine	Neuroscience Training Program	CO	G
University of Connecticut	Physiology & Neurobiology	CN	G
University of Connecticut Health Ctr	Neuroscience Graduate Program	CN	G
University of Delaware	Graduate Program In Behavioral Neuroscience	DE	G
University of Illinois at Chicago	Department of Anatomy and Cell Biology	IL	G
University of Illinois at Chicago	Graduate Program In Neuroscience	IL	G
University of Illinois at Urbana-Champaign	Neuroscience Program	IL	G
University of Maine	Graduate School of Biomedical Sciences	ME	G
University of Maryland, Baltimore	Program In Neuroscience	MD	G
University of Maryland, College Park	Neuroscience and Cognitive Science Program	MD	G
University of Massachusetts	Department of Psychology	MA	G
University of Massachusetts Medical School	Program In Neuroscience	MA	G
University of Massachusetts, Amherst	Neuroscience and Behavior Program	MA	G
University of Miami	Behavioral Science	FL	G
University of Michigan	Neuroscience Graduate Program	MI	G
University of Minnesota	Graduate Program In Neuroscience	MN	G
University of Mississippi Medical Center	Graduate Program In Neuroscience	MS	G
University of Nebraska at Kearney	Psychobiology	NE	UG
University of New Mexico	Department of Neurosciences	NM	G
University of Oklahoma	Cellular and Behavioral Neurobiology	OK	G
University of Pittsburgh	Center For Neuroscience	PA	G
University of Pittsburgh	Department of Neuroscience	PA	UG
University of Rochester	Neuroscience Graduate Program	NY	G
University of Rochester	Undergrad Program in Biol & Med-Neurosci Concentration	NY	UG
University of South Carolina	Neuroscience Training Program	SC	G
University of South Florida	Neuroscience Program	FL	G
University of St. Thomas	Neuroscience Program	MC	UG
University of Tennessee Health Science Center	Neuroscience Graduate Program	TN	G
University of Texas at Austin	Institute For Neuroscience	TX	G
University of Texas Health Science Center, San Antor	Predoctoral Neuroscience Training Program	TX	G
University of Texas Medical Branch, Galveston	Neuroscience Graduate Program	TX	G

Institutional Program (IP) Member Types:			
U=Undergraduate (51)	G=Graduate (123)	**TOTAL = 179**	
PD=Postdoc (5)	*4 New Programs*		
ACTIVE INSTITUTIONAL PROGRAM (IP) MEMBERS			
Institution	**Program Name**	**State/Province**	**Type**
University of Texas Medical School at Houston	Department of Neurobiology and Anatomy Graduate Program	TX	G
University of Texas San Antonio	Department of Biology/Neurobiology	TX	G
University of Toronto	Collaborative Program In Neuroscience	ONTARIO	G
University of Utah	Neuroscience Program	UT	G
University of Vermont	Neuroscience Graduate Program	VT	G
University of Virginia	Neuroscience Graduate Program	VA	G
University of Washington	Graduate Program In Neurobiology & Behavior	WA	G
University of Western Ontario	Graduate Program In Neuroscience	ONTARIO	G
University of Wisconsin	Neuroscience Training Program	WI	G
University of Wyoming	Graduate Program In Neuroscience	WY	G
USC	Neuroscience Graduate Program (NGP)	CA	G
Vanderbilt Brain Institute	Neuroscience Graduate Program	TN	G
Virginia Commonwealth University	Interdisciplinary Neuroscience Curriculum	VA	G
Vollum Institute/Oregon Health & Science Univ	Vollum Institute/ OHSU Neuroscience Graduate Program	OR	G
Wake Forest University School of Medicine	Neuroscience Program	NC	G
Washington & Lee University	Neuroscience Program	VA	UG
Washington State University	Graduate VCAPP	WA	G
Washington College	Behavioral Neuroscience Program in Psychology	MD	UG
Washington University	Program In Neuroscience	WA	G
Wayne State University	Translational Neuroscience Program	MI	G
Western Washington University	Behavioral Neuroscience Program	WA	UG
Westminster College	Neuroscience Program	PA	UG
Williams College	Neuroscience Program	MA	UG
Wright State University	Department of Neuroscience, Cell Biology and Physiology	OH	G
WVU School of Medicine	Neuroscience Graduate Program	WV	G
Yale University	Graduate Department of Neurobiology	CT	G
Non-Renewed IP Members			
Georgia Health Sciences University	Graduate Program in Neuroscience	GA	G
Mayo Graduate School	Neurobiology of Disease Program	MN	G
McGill University	Integrated Program in Neuroscience	QUEBEC	G
New Jersey Medical School, UMDNJ	Department of Neurology and Neurosciences	NJ	G
Skidmore College	Neuroscience Program	NY	UG
University of California, Irvine	Interdepartmental Neuroscience/Biological Sciences	CA	G
University of Southern California	Neurobiology PhD Program	CA	G
University of Wisconsin	Neuroscience and Public Policy Program	WI	G
Wesleyan University	Neuroscience and Behavior Program	CT	UG

Institutional Program Membership
Updated: March 2012

The Society for Neuroscience (SfN) Institutional Program (IP) membership is available to academic departments and programs that award an undergraduate major or advanced degree in neuroscience or a neuroscience-related discipline. A neuroscience program is defined as a formal program at any educational or research facility that includes pre- or postdoctoral trainees with a primary interest in scientific investigation of the nervous system. This may include a variety of administrative structures, including, but not limited to a subsection of a larger department, a separate department, or an interdepartmental program.

As a SfN IP member, programs and departments are included in the Directory of Neuroscience Training Programs on the SfN Web site. Each IP member may designate up to two official representatives for each membership year, and designate one as the primary contact person.

Member Benefits
SfN IP membership offers a variety of benefits to help promote the success of neuroscience and neuroscience-related departments and programs:

- A listing in the online searchable directory of neuroscience training programs
- Inclusion in a biennial survey of neuroscience training programs
- One free IP member e-mail notice or one-time access to the IP mailing list *(additional requests are $100 each)*
- One free e-mail blast to SfN's student members
- Reduced registration fee for the annual spring meeting
- Purchase one NeuroJobs posting and get the next one half-price
- Discounted NeuroJobs Career Center and Graduate School Fair exhibit space at SfN annual meeting
- Access to the Neuroscience Departments and Programs booth at the SfN annual meeting for displaying program brochures and information
- Undergraduate students affiliated with an IP member are eligible for travel awards to the SfN annual meeting
- IP member representatives can be nominated for service on the Committee on Neuroscience Departments and Programs

Application and Renewal
At this time, SfN can only accept IP membership new applications by mail. Please complete the appropriate form below and return it to the following SfN address:

Society for Neuroscience
1121 14th St NW
Suite 1010
Washington, DC 20005

IP Membership Renewal Form
New IP Membership Application Form

2012 Institutional Program (IP) Membership Categories and Fees

Graduate or Postdoctoral Program	$285
Undergraduate Program	$110

To print a 2012 IP renewal invoice, click here.

For more information, view detailed category definitions in Article III of SfN's bylaws and corresponding resolutions, or contact membership@sfn.org.

Members from Developing Countries

To support members residing in resource-restricted areas and to encourage international participation in the Society and its programs, SfN offers reduced membership dues to residents of developing countries.

SfN determines reduced dues eligibility using the World Bank's country classifications. SfN updates the list of eligible countries annually in the fall prior to billing for the upcoming year's dues. Reductions and categories are based on a member's work and residence addresses. Members that work or reside outside of these geographical locations are required to pay full membership dues.

Members who qualify fall into two reduced dues categories:

Category I
Category II
Category III

Reduced dues for Category I, II and III members for 2012:

Regular Category I and Mexico	$21
Regular Category II	$52
Regular Category III	$88
Post-Doc Category I and Mexico	$16
Post-Doc Category II	$42
Post-Doc Category III	$67
Student Category I and Mexico	$11

Student Category II	$21
Student Category III	$27
Student Undergraduate (Category III, II, I & Mexico)	$11

Reduced Dues Category I

Reduced Dues Category I includes countries classified by the World Bank as "low-income economies."

Designated Category I countries are:

Afghanistan	Gambia	Myanmar
Bangladash	Guinea	Nepal
Benin	Guinea-Bissau	Niger
Burkina Faso	Haiti	Rwanda
Burundi	Kenya	Sierra Leone
Cambodia	North Korea	Somalia
Central African Rep.	Kyrgyzstan	Tajikistan
Chad	Liberia	Tanzania
Comoros	Madagascar	Togo
Congo, Dem. Rep.	Malawi	Uganda
Eritrea	Mali	Zimbabwe
Ethiopia	Mozambique	

Reduced Dues Category II

Reduced Dues Category II includes countries classified by the World Bank as "lower-middle-income economies".

Designated Category II countries are:

Angola	Indonesia	Sao Tome & Principe
Armenia	Iraq	Senegal
Belize	Kiribati	Soloman Islands
Bhutan	Kosovo	Sri Lanka
Bolivia	Laos	Sudan
Cameroon	Lesotho	Swaziland
Cape Verde	Marshall Islands	Syria

Congo, Rep.	Mauritania	Timor-Leste
Cote d'Ivoire	Micronesia	Tonga
Djibouti	Moldova	Turkmenistan
Egypt	Mongolia	Tuvalu
El Salvador	Morocco	Ukraine
Fiji	Nicaragua	Uzbekistan
Georgia	Nigeria	Vanuatu
Ghana	Pakistan	Vietnam
Guatemala	Papua New Guinea	West Bank & Gaza
Guyana	Paraguay	Yemen
Honduras	Philippines	Zambia
India	Samoa	

Reduced Dues Category III

Reduced Dues Category III includes countries classified by the World Bank as "upper-middle-income economies"

Designated Category III countries are:

Albania	Ecuador	Palau
Algeria	Gabon	Panama
American Samoa	Grenada	Peru
Antigua and Barbuda	Iran	Romania
Argentina	Jamaica	Russia
Azerbaijan	Jordan	Serbia
Belarus	Kazakhstan	Seychelles
Bosnia & Herzegovina	Latvia	South Africa
Botswana	Lebanon	St. Kitts and Nevis
Brazil	Libya	St. Lucia
Bulgaria	Lithuania	St. Vincent & the Grenadines
Chile	Macedonia, FYR	Suriname
China	Malaysia	Thailand
Colombia	Maldives	Tunisia
Costa Rica	Mauritius	Turkey
Cuba	Mayotte	Uruguay
Dominica	Montenegro	Venezuela
Dominican Republic	Namibia	

Countries listed above are approved for year 2012 dues reductions based on The World Bank country classifications as of July 1, 2011.

NDP NEWS
E-newsletter for Institutional Program Members

Winter 2012

In this Issue:

- 2012 Spring NDP Conference
- 2011 Training Program Survey
- IP Membership Renewal
- Nominations for CNDP
- Watch the NSP Video
- Register for IWiN Workshop
- Summer Programs
- Neuroscience 2011 Highlights
- SfN Spotlight

Save the Date

Capitol Hill Day
March 29
Washington, DC

2012 Annual NDP Spring Conference
March 30
Washington, DC

IWiN Workshop
April 23-24
University of California, Irvine

Registration is now open
2012 Annual Spring Conference of Neuroscience Departments and Programs
Sustaining Training Program Vitality During Challenging Times
Keynote speaker: Steven Hyman, former provost of Harvard University
Reductions in funding and continuing changes in the structure of science create challenges for research training, but also promote creativity and opportunities to reform and revitalize neuroscience training programs. Join the discussion on March 30 in Washington, DC. Reserve your hotel room by February 27 to secure discounted rates.

Don't Miss Out on Contributing to the 2011 Training Program Survey
The 2011 biennial Neuroscience Training Program Survey was sent to all IP members in October, and 126 have completed it so far. If you haven't already, please complete the survey as soon as possible. Timely responses allow SfN to process the information and prepare a report for publication in early summer. Complete the Undergraduate Survey and/or Graduate Survey online. If you have questions or comments, e-mail ndp@sfn.org.

2012 IP Membership Renewal
The new year is underway, so don't forget to renew your IP membership to take advantage of existing benefits and new offerings being developed to meet the needs of IP members. Renew online. Don't miss what SfN has in store for IP members in 2012.

Committee on Neuroscience Departments and Programs Nominations
The SfN Committee on Neuroscience Departments and Programs (CNDP) oversees IP membership and develops programs and activities that support SfN's higher education and training strategy. Nominations for the committee are now being accepted when you renew your IP membership. **Nominees must also be an active individual SfN member.**

Watch the Neuroscience Scholars Program Video

In celebration of the 30th anniversary of the NINDS-funded Neuroscience Scholars Program (NSP), SfN produced a video with personal accounts from past scholars and program leaders. The NSP provides underrepresented minorities with access to valuable networking, mentoring, and professional development resources and has been highly successful in helping more than 550 young neuroscientists advance in their careers. Visit the SfN YouTube channel to watch the video and learn more about the program.

Register for the Final IWiN Workshop for Department Chairs
SfN will hold the fifth and final workshop under its National Science Foundation-funded project, Department Chair Training to Increase Women in Neuroscience (IWiN), on April 23-24, at the University of California, Irvine. Be part of this unique opportunity to learn strategies for effective recruitment, advancement, and creation of favorable work climates for female faculty and faculty from diverse backgrounds. West coast institutions in particular are encouraged to apply. Registration deadline extended to: January 31.

Summer Programs

Do You Have a Graduate Summer Research Program?
SfN is compiling a comprehensive list of summer research programs to post online as an educational opportunity resource for students. If you have a program to advertise, send a brief program description, a link, and due date(s) for applications to ndp@sfn.org.

Do You Have an Undergraduate Internship/Research Program?
The Faculty for Undergraduate Neuroscience (FUN) maintains a list of neuroscience internship/research opportunities for undergraduates. This is a high-traffic list with good visibility. If you would like to include your program, e-mail Jared Young at jyoung@mills.edu with a link to more information about your internship and a due date. You also can provide additional text for the posting.

Summer Program in Neuroscience Ethics & Survival (SPINES)
Encourage your graduate students and postdoctoral fellows to apply for SPINES. This program, funded by the National Institute of Mental Health and offered at the Marine Biological Laboratory in Woods Hole, Mass., has contributed to the professional development of graduate students and postdoctoral researchers for more than 20 years. The course offers distinguished faculty, and many former students view their time in SPINES as a transformative experience in their careers.

SPINES is open to all, but individuals from underrepresented minority groups, from economically or socially disadvantaged backgrounds, and individuals with disabilities are especially encouraged to apply.

The deadline for submission of applications is **February 1**. View more information and how to apply online.

Neuroscience 2011 Highlights

Thank you for joining SfN in Washington, DC. More than 32,000 people attended this year's meeting. Highlights for those involved in neuroscience training included:

Award for Education in Neuroscience

The Award for Education in Neuroscience recognizes individuals with a distinguished career who have made outstanding contributions to neuroscience research and education. Julio Ramirez, Davidson College, was presented the award at the meeting's NDP reception on November 13.
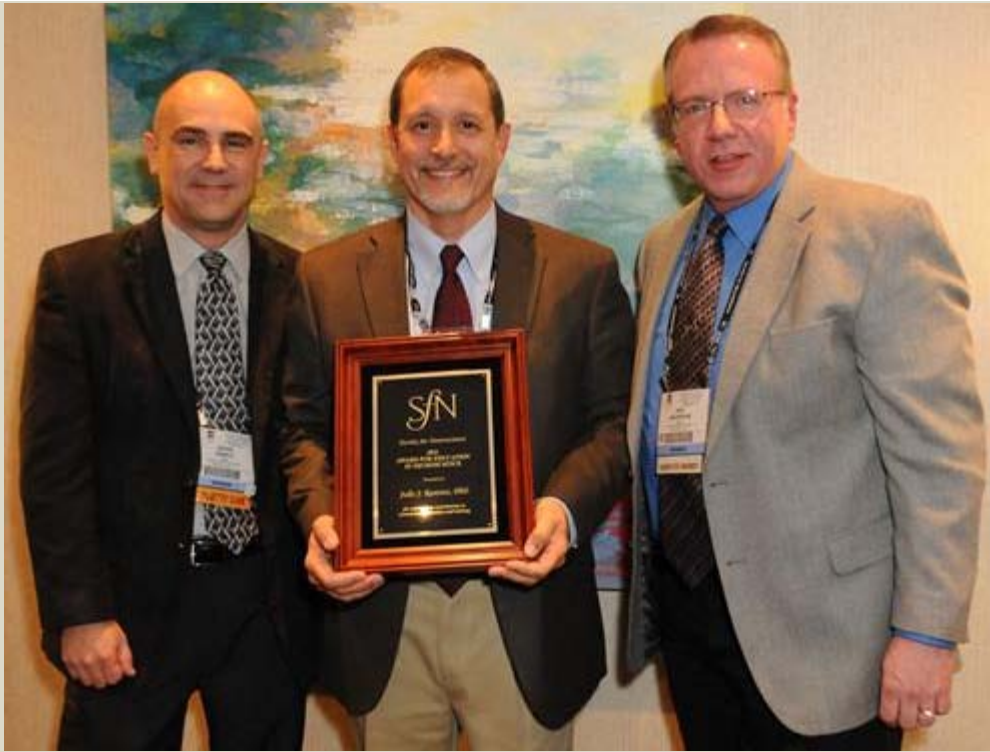
From left: CNDP Chair David Riddle, Award for Education in Neuroscience Award recipient Julio Ramirez, Faculty for Undergraduate Neuroscience liaison to CNDP Eric Wiertelak

Travel Awards

The inaugural Undergraduate Travel Awards, supported through CNDP, were presented at the Neuroscience 2011 NDP reception. Seven students received the awards, while an additional 73 graduate students and postdoctoral fellows received travel awards through SfN chapters and SfN's Professional Development Committee. All awardees presented their research at the Travel Award Recipients Poster Session on November 12.

From left: Alex Burkowsky, Samuel Brook, Miren Edelstein, CNDP Chair David Riddle, Harry Han, Peter Massey, Madhavi Senagolage (Not pictured: Jacqueline Ferland)

Professional Development Workshops
Neuroscience 2011 offered [14 Professional Development Workshops](#) with more than 3,400 total attendees. Subjects ranged from *NIH and NSF Funding for Your Research and Training* to introducing SfN's NSF-funded project, *Educational Resources in Neuroscience* (ERIN), a Web portal for listing, reviewing, and rating teaching resources for higher education. The workshop on navigating the SfN meeting, led by CNDP Chair David Riddle and FUN President Shelly Dickinson, was well-attended by students and other first-time meeting attendees.

SfN Spotlight

This Spring Tell Congress to Make Science a National Priority
On March 29, SfN will host the fifth annual Capitol Hill Day in Washington, DC. SfN members will head to the Capitol to discuss with congressional representatives the latest neuroscience discoveries that have been achieved through bold national investment in biomedical research. Every year Hill Day attendees play a critical role in relaying to Congress how federal investments in science affect lawmakers' districts and states, fostering the discovery of new medical treatments, creating jobs, and improving the nation's economy. To register and learn more, contact advocacy@sfn.org.

Society for Neuroscience - IP Member Directory

Learn more about SfN's higher education and training strategy and Institutional Program (IP) membership. The Committee on Neuroscience Departments and Programs serves IP members through programs, activities, and initiatives that advance education and research training in academic neuroscience.

Switch to Advanced Search

Quick Search
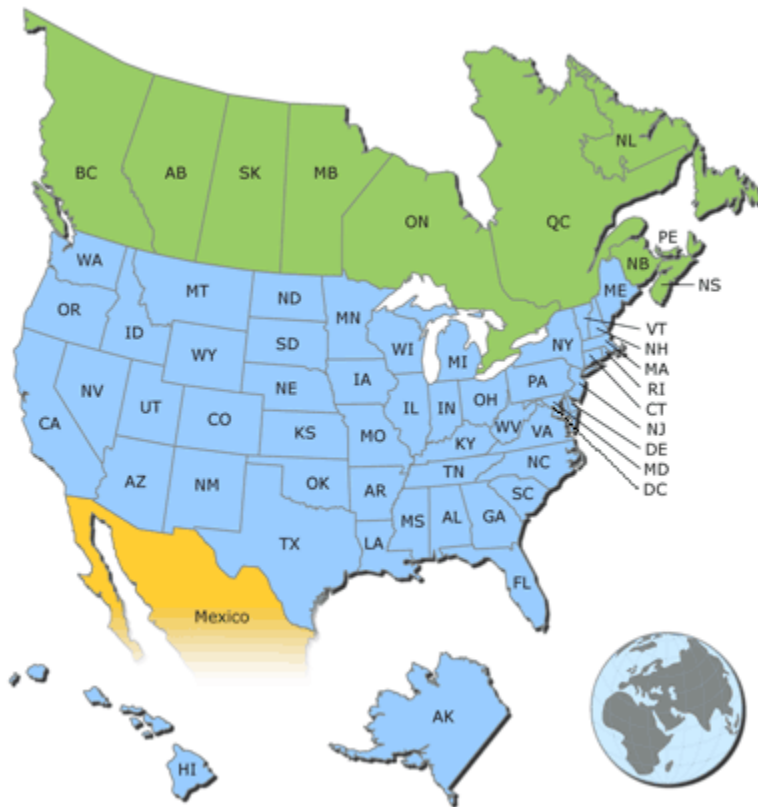
Society for Neuroscience - IP Member Directory

SfN

ANDP and the Society for Neuroscience have consolidated effective July 1, 2009. Learn more about SfN's new higher education and training strategy and Institutional Program (IP) Membership. The Committee on Neuroscience Departments and Programs serves IP Members through programs, activities, and initiatives that advance education and research training in academic neuroscience.

Return to the Search Page

Institution	Type	Program Name	State/Prov	Country	Degree
	All		NY	All	
SUNY Stony Brook	Graduate	Graduate Program In Neuroscience	NY	United States	
Mount Sinai School of Medicine	Graduate	Interdisciplinary Graduate Training Program In Neuroscience	NY	United States	PhD (Neuroscience) PhD (Biomedical Sciences) MS (Biomedical Sciences)
University of Rochester	Graduate	Neuroscience Graduate Program	NY	United States	PhD (Neurobiology and Anatomy) PhD (Neuroscience)
Cornell University	Graduate	Behavioral and Evolutionary Neuroscience Program	NY	United States	PhD PhD (Psychology)
University of Buffalo	Graduate	Behavioral Neuroscience Graduate Program	NY	United States	
Columbia University	Graduate	Program in Neurobiology and Behavior	NY	United States	
Columbia University	Postdoctoral	Postdoctoral Department of Neuroscienec	NY	United States	
Albert Einstein College of Medicine	Graduate	Dominick P. Purpura Department of Neuroscience	NY	United States	PhD MD
State University of New York Binghamton	Graduate	Behavioral Neuroscience	NY	United States	
University of Rochester	Undergraduate	Undergrad Program in Biol & Med-Neurosci Concentration	NY	United States	
New York University	Graduate	Center For Neural Science	NY	United States	
Ithaca College	Undergraduate	Neuroscience Minor	NY	United States	

|◀ ◀ 1 ▶ ▶| Page size: 20   16 items in 1 pages

Institution	Type	Program Name	State/Prov	Country	Degree
					▽
Cornell University: Weill Cornell Medical College	Undergraduate	Imagine:Ithaca Manhattan Graduate Initiative In Neuroscience	NY	United States	
State University of New York, Binghamton University	Undergraduate	Integrative Neuroscience	NY	United States	
Queens College - City University of New York	Undergraduate	Neuroscience	NY	United States	
New York University	Graduate	Neuroscience & Physiology	NY	United States	PhD

|◁ ◁ 1 ▷ ▷| Page size: 16 items in 1 pages

Davidson College
Neuroscience Program

Contact:

Julio J Ramirez, PhD
Davidson College
Box 7017, Watson Building, Room 202
Davidson, NC 28035-7017

Telephone: (704) 894-2888
Fax: (704) 894-2512

E-mail: juramirez@davidson.edu
URL: http://www.davidson.edu/neuroscience/

Program Type: Undergraduate

Areas of Research: Behavioral Neuroscience; Cellular and Molecular Neuroscience; Developmental Neuroscience; Neuropharmacology and Neurochemistry; Neuroregeneration and Repair; Neuroscience of Aging

Student Demographics	
Female:	50%
Non-US Citizens:	3%
US Citizens:	
Ethnicity	
» **Hispanic or Latino:**	3%
» **Not Hispanic or Latino:**	97%
Race	
» **Black or African American:**	6%
» **American Indian or Alaskan Native:**	
» **Asian:**	3%
» **Native Hawaiian or Other Pacific Islander:**	
» **White:**	91%

Available Degrees and Programs: BS (Neuroscience); BS (Psychology); BS (Biology); BS (Chemistry)

Year Established: 1991

Number of Training Faculty: 4
Number of students currently enrolled: 16

Program Description: Neuroscience students take a comprehensive mix of psychology, biology, physics, chemistry, mathematics, and philosophy. Students have opportunities to become involved in research in the areas of brain plasticity, biological basis of drug abuse, protein biochemistry of myelin, and neural development.

Admission Information: http://www3.davidson.edu/cms/x384.xml

Availability of Stipends/Assistantships and Financial Assistance: Yes

Available University Housing: Yes

Available University-affiliated Day Care: No

Last Updated: Tuesday, November 09, 2010

COMMITTEE ON NEUROSCIENCE DEPARTMENTS AND PROGRAMS: WORKSHOPS/ACTIVITIES AT THE 2011 ANNUAL MEETING

Workshop/Event	Title	Description
Professional Development Workshops	Getting the Most Out of SfN: The Annual Meeting and Beyond	For those attending the SfN Annual Meeting for the first time, navigating the many activities can be overwhelming and taking advantage of all the opportunities is challenging. Students and others new to the SfN meeting are invited to this session where experienced participants will share tips on how to get the most value during and after the conference. Whether you are looking for networking strategies or simply ways to make your experience productive and enjoyable, this session will be beneficial. Representatives from SfN staff, the SfN Program Committee and Committee on Neuroscience Departments and Programs, and the Faculty for Undergraduate Neuroscience (FUN) will provide strategies for navigating the annual meeting, discuss professional development tools available during and after the conference, and answer questions from participants.
	Teaching Neuroscience	Announcing ERIN, "Educational Resources in Neuroscience," the Society's new Web site to list, review, and rate resources for higher education. ERIN's board of editors will present highlights in each of their topic areas: Development, Cellular (Excitability, Synapses, and Glia), Disorders of the Nervous System, Sensory and Motor Systems, Homeostatic and Neuroendocrine Systems, and Cognition and Behavior.
NeuroJobs Job Fair		Advance your neuroscience career by attending the NeuroJobs Job Fair, a one-day event debuting at Neuroscience 2011. Meet employers from industry, non-profit organizations, and academia. Take advantage of the three workshops running concurrently in the same location, covering varying career paths in neuroscience. The events are free for all registered meeting attendees.
CNDP Meeting		
Neuroscience Departments and Programs Reception		Join the SfN Committee on Neuroscience Departments and Programs for its annual reception and presentation of Undergraduate Travel Awards and the Award for Education in Neuroscience.
Faculty for Undergraduate Neuroscience Social		Socialize and exchange ideas with others interested in undergraduate neuroscience research and education. Undergraduates will present posters of their research, and FUN Student Travel Awards and Educator of the Year Award will be presented. SOMAS awardees and their students will be introduced. See the FUN website for travel award information and registration for poster presentations at the FUN Social (www.funfaculty.org).
Committee on Neuroscience Departments and Preograms (CNDP) Booth		The NDP booth serves as a place where students and attendees can retrieve information about graduate and post doctoral programs and speak with and acquire institutional knowledge from CNDP members, who volunteer for times at the booth.
Faculty for Undergraduate Neuroscience (FUN) Booth		The FUN booth is an area that serves undergraduate neuroscience. It provides a space where colleges and students have the opportunity to learn about Undergraduate Neuroscience programs, FUN, and become members of FUN.
Faculty for Undergraduate Neuroscience Social: Social, Awards, & Poster Presentations		Socialize and exchange ideas with others interested in undergraduate neuroscience research and education. Undergraduates will present posters of their research, and FUN Student Travel Awards and Educator of the Year Award will be presented. See the Faculty for Undergraduate Neuroscience (FUN) website for travel award information and registration for poster presentations at the FUN Social.
Poster Sessions	Travel Awards Recipients Poster Session	Join us for posters presented by undergraduate, graduate, and postdoctoral recipients of SfN's travel award programs.

Neuroscience Departments & Programs Grad Fair

This year at Neuroscience 2012, the Society will host the first annual **Neuroscience Departments & Programs (NDP) Graduate Fair**. The Graduate Fair provides **prospective students** and **graduate schools** with an opportunity to meet face-to-face at Neuroscience 2012.

The event is free for all meeting attendees.

Time and Location:
TBD Time
TBD Location

Exhibit Space Fees:

Fees include:
- TBD size table
- Single line text identification sign showing the exhibiting institution and table number
- Complimentary registration (Grad Fair floor only) for up to three table personnel

Exhibitor Categories	Table Cost
SfN Institutional Program (IP) Member ([learn more](#))	$200
Non-IP Members	$350

Exhibitor Information:
Application and full payment are due TBD, 2012.   Exhibitors must review the following items:
- [Exhibit Prospectus](#)
- [Application and Contract](#)
- [Floor Plan](#)

Installation and Dismantle Times:
Installation Time: TBD
Dismantle Time: TBD

Please direct any questions regarding the NDP Grad Fair to:
1121 14th Street, NW, Suite 1010
Washington, DC 20005
Phone: (202) 962-4000
Fax: (202) 962-4941
E-mail: NeuroJobs@sfn.org

SfN Travel Award Programs
Update: March 2012

<u>INTRODUCTION</u>

SfN offers a number of different travel award programs to facilitate attendance at its annual meetings – one is overseen by the Professional Development Committee (PDC); another is offered through the Committee on Neuroscience Departments and Programs (CNDP). These programs provide awards at the graduate student, postdoctoral, and undergraduate levels. North American graduate student and postdoctoral winners receive $1,000 each and non-North American winners receive $2,000 each. Undergraduate travel award winners receive $750 each.

Two other travel award programs – Chapter Travel Awards managed by the Membership & Chapters Committee and International Fellows Travel Awards offered through the International Brain Research Organization (IBRO). For Neuroscience 2011, a total of 43 Chapter Travel Awards have been made to graduate students and postdoctoral fellows. As each year, SfN is again supporting 30 travel awards to neuroscientists under the age of 35 from developing countries.

<u>GRADUATE STUDENT & POSTDOCTORAL FELLOW TRAVEL AWARDS</u>

These travel awards were established in 1980 to provide financial support to graduate students and postdoctoral fellows presenting as first authors of an abstract at the SfN annual meeting. Award recipients are selected by the PDC based on the scientific merit of the applicant's abstract, letter of recommendation from a principal investigator or advisor, research and career goals, and an essay on an inspiring woman scientist. Both applicants and their advisors must be SfN members.

For Neuroscience 2011, SfN received **180 applications** – **108** from graduate students and **72** from postdoctoral fellows. A total of **29 awards** (16%) were made – 16 to graduate students and 13 to postdocs – totaling **$32,000**. Women accounted for 70% of the applications and 81% of the awardees.

	2011		2010	
	Nominations	**Awards**	**Nominations**	**Awards**
Grad. Students	108	16	120	16
Postdocs	72	13	83	9
TOTAL	180	29	203	25

The number of awards SfN is able to distribute is partly depending on external funding levels. This year, Eli Lilly contributed $20,000 for the graduate student awards, while the Burroughs-Wellcome Fund provided partial sponsorship of $10,000 for postdoctoral fellow awards.

Applications for Neuroscience 2012 Travel Awards are now available on the SfN.org Web site, and are due on June 1, 2012

Graduate Students:
Roee Admon, Tel Aviv University
Brielle Bjorke, University of Nevada – Reno
Miriam Bocarsly, Princeton University
Allison Brager, Kent State University
Meaghan Bychowsky, University of Wisconsin – Madison
Elizabeth Cox, University of North Carolina at Chapel Hill
Kelly Jones, Northwestern University
Dorit Kliemann, Freie Universtat – Berlin
Amanda Laque, Louisiana State University
Kihwan Lee, Seoul National University
Jesus Mena, University of Wisconsin – Madison
Joseph Ransdell, University of Missouri – Columbia
David Ritter, Thomas Jefferson University
Florence Rousotte, University of California – Los Angeles
Romy Wichmann, University of Groningen
Adelaide Yiu, University of Toronto

Postdoctoral Fellows:
Sara Aton, University of Pennsylvania
Hibah Awwad, University of Oklahoma Health Service Center
Tamara Blutstein, Tufts University School of Medicine
Leigh Botly, The Hospital for Sick Children
Sloka Iyenger, Nathan Kline Institute for Psychiatric Research
Sharna Jamadar, Institute of Living
Agnes Jasinka, University of Michigan – Ann Arbor
Amit Kamboj, University of Manitoba
Julien Rossignol, Central Michigan University
Kelly Rowe, University of Iowa Hospital and Clinics
Laura Schaevitz, Tufts University
Shannon Shields, Yale University
Deborah Watson, University of Texas at Austin

UNDERGRADUATE TRAVEL AWARDS

New in 2011, these travel awards honor outstanding undergraduate student researchers nominated by SfN's Institutional Program (IP) members. The award includes complimentary registration and $750, which aligns with the amount given by the Faculty for Undergraduate Neuroscience for travel awards to the SfN annual meeting.

The Committee on Neuroscience Departments and Programs selects winners based on the scientific merit of their abstracts, their participation in the presented research, a letter of nomination from their research advisor, and a personal statement regarding how attendance at the SfN meeting will enhance their professional goals.

In its inaugural year, CNDP received **23 applications** – A total of **7 awards** (41%) were given totaling **$5,250**. Women accounted for 53% of the applications and 43% of the awardees.

Applications for Neuroscience 2012 Undergraduate Travel Awards are now available on the SfN.org Web site, and are due on June 1, 2012.

AWARDS WINNERS 2011
Samuel Brook, Skidmore College
Alex Burkowsky, University of Pittsburgh
Miren Edelstein, University of California – Berkeley
Jacqueline Ferland, University of British Columbia
Harry Han, Rice University
Peter Massey, Drexel University
Maghavi Senagolage, Lake Forest College

1. Questions for all

What type of neuroscience department/program are you affiliated with?

- Undergraduate
- Graduate
- Postdoctoral

Are you the chair/head of your department/program?

- Yes
- No

Have you attended annual NDP spring conference(s) in the past?

- Yes
- No

Did you attend this year's NDP spring conference March 25th, 2011 in Washington, DC?

- Yes
- No

2. Questions for 2011 NDP Conference Attendees

Overall, how well did the conference meet your expectations?

	Did not meet expectations		Met expectations		Greatly exceeded expectations
Rating	⬚	⬚	⬚	⬚	⬚

PLEASE RATE THE FOLLOWING 2011 CONFERENCE SESSIONS:

Keynote Address: The Neuroscience and Neurotechnology of Teaching and Learning in the Digital Age, David H. Rose (Center for Applied Special Technology – CAST)

	Very poor		Moderate		Excellent
Interesting/relevant content	⬚	⬚	⬚	⬚	⬚
Quality of presentation	⬚	⬚	⬚	⬚	⬚

Other comments and feedback:

```



```

FUN Update, Shelly Dickinson (St. Olaf College), President, FUN

	Very poor		Moderate		Excellent
Interesting/relevant content	⬚	⬚	⬚	⬚	⬚
Quality of presentation	⬚	⬚	⬚	⬚	⬚

Other comments and feedback:

```



```

Focus on Undergraduate Neuroscience Education: Opportunities, Challenges and the Bottom Line,
Carl D. Hopkins (Cornell University), Shelly Dickinson (St. Olaf College), Henning Schneider (DePauw University)

	Very poor		Moderate		Excellent
Interesting/relevant content	⬚	⬚	⬚	⬚	⬚
Quality of presentation	⬚	⬚	⬚	⬚	⬚

Other comments and feedback:

```



```

Deconstructing Neuroscience Graduate Curricula: The Importance of Non‑Didactic Coursework and Assessment Strategies, Alan F. Sved (University of Pittsburgh), David A. Morilak (University of Texas Health Science Center at San Antonio;CNDP member), Melissa Pangelinan (University of Maryland – College Park), Bridget N. Queenan (Georgetown University)

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

Lunch discussions on possible strategic initiatives and future workshop topics.

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

An MS Degree in Neuroscience: Is It Worth the Effort?Michael N. Lehman (University of Michigan; CNDP member), Andrew J. Bean (University of Texas Health Science Center at Houston), Susan D. Croll (Regeneron), Paul McGonigle (PsychoGenics, Inc.)

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

National Research Council: 2010 Rankings of Doctoral Programs in America, Charlotte V. Kuh (National Research Council)

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

Funding for Graduate Neuroscience Education in the Twenty-Teens: Who Will Be Supported and by Whom? Stephen J. Korn (NIH/NINDS), Gisele T. Muller-Parker (NSF)

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

```
                                        5


                                        6
```

"ENDURE" (Enhancing Neuroscience Diversity through Undergraduate Research Education) program, Michelle D. Jones-London (NIH/NINDS)

	Very poor		Moderate		Excellent
Interesting/relevant content	🔘	🔘	🔘	🔘	🔘
Quality of presentation	🔘	🔘	🔘	🔘	🔘

Other comments and feedback:

```
                                        5


                                        6
```

Please share any other general comments regarding the spring conference:

```
                                        5


                                        6
```

3. Question for those who did not attend the 2011 NDP Conference

Why did you not attend this year's spring conference (select all that apply)?

- Timing/schedule: Bad time of the year
- Timing/schedule: Bad time of the week
- Wasn't aware of the conference
- Lack of funding
- Content did not seem relevant/interesting

Other (please specify)

4. Questions for all

What is the likelihood that you would attend next years NDP conference in Washington, DC on Friday March 30th, 2012?

	Highly unlikely		Somewhat likely		Highly Likely
Likelihood	▫	▫	▫	▫	▫

What is the likelihood that you would attend a future NDP conference if it were held in the following cities?

	Highly unlikely		Somewhat likely		Highly Likely
Atlanta, GA	▫	▫	▫	▫	▫
Chicago, IL	▫	▫	▫	▫	▫
Minneapolis, MN	▫	▫	▫	▫	▫
New Orleans, LA	▫	▫	▫	▫	▫
San Antonio, TX	▫	▫	▫	▫	▫
San Diego, CA	▫	▫	▫	▫	▫
San Francisco, CA	▫	▫	▫	▫	▫
St Louis, MO	▫	▫	▫	▫	▫

What is the likelihood that you would attend a half-day hands-on workshop on teaching neuroscience prior to the conference, Thursday, March 29th, 2012?

	Highly unlikely		Somewhat likely		Highly Likely
Likelihood	▫	▫	▫	▫	▫

What is the likelihood that you would attend a half-day hands-on workshop on teaching neuroscience for a fee of $150?

	Highly unlikely		Somewhat likely		Highly Likely
Likelihood	▫	▫	▫	▫	▫

What kinds of topics, sessions, and formats would you like to see offered at future NDP conferences?

During the NDP conference lunchtime discussions, many of you shared ideas for possible strategic initiatives aimed at meeting the needs of SfN's Institutional Program members and for possible future workshop topics. Listed below are the most common themes that emerged. On a scale of 1-5, please indicate the importance of each idea.

	Low importance	2	3 Medium importance	4	High importance
Recruiting practices for graduate programs	☐	☐	☐	☐	☐
Hitting the right number of PhD candidates in the admissions process	☐	☐	☐	☐	☐
Better integrating activities between CNDP and FUN to address the needs of undergraduate institutions.	☐	☐	☐	☐	☐
Enhanced functionality of SfN Web site and resources available to neuroscience departments and programs	☐	☐	☐	☐	☐
Dissemination of best practices in neuroscience training and education	☐	☐	☐	☐	☐
Faculty development workshops on curriculum design and state-of-the-art teaching tools	☐	☐	☐	☐	☐
Workshops on preparing students for graduate school, various careers, and professional skills	☐	☐	☐	☐	☐

SƒN

Neuroscience Departments and Programs

News and Announcements

Save-the-Date!

The Annual Spring Conference of Neuroscience Departments and Programs on *Sustaining Training Program Vitality During Challenging Times* will take place March 30, 2012 in Washington, DC. Registration is now open. Additional information about the conference will be available in the coming weeks.

The **2009 Biennial Survey Report of Neuroscience Departments and Programs** is now available on the Neuroscience Departments and Programs Survey Page.

Mentee Registration Now Open
Looking for a mentor? SfN's new mentor matching program is now open for mentee registration.

Neuroscience Departments and Programs

• Learn about the Annual Spring Conference of Neuroscience Departments and Programs.

• See Neuroscience Departments and Programs Survey Results

• View the Institutional Programs Directory.

• Read the latest Institutional Program Newsletter.

• Join SfN as an Institutional Program member.

• View frequently asked questions about SfN's consolidation with the Association of Neuroscience Departments and Programs.

Strategy
Higher education and training strategy is aimed at serving the needs of the large segment of SfN's membership engaged in training new generations of neuroscientists. As the field of neuroscience continues to attract growing numbers of trainees, the profession can benefit from coordinated engagement of and support for the "stewards of the discipline."

Committee
The Committee on Neuroscience Departments and Programs (CNDP) works to enhance the value SfN provides to its institutional members (neuroscience departments and programs) through programs, activities, and initiatives that advance education and research training in academic neuroscience.

Programs/Activities

- *Neuroscience Departments and Programs Directory* - Online directory of member neuroscience departments and programs.
- *Biennial Survey of Neuroscience Departments and Programs* - A nation-wide survey of training programs in neuroscience, in which data are acquired on numbers of students, postdoctoral and faculty, curricular emphases, funding sources, and manpower needs.
- *Annual Spring Conference of Neuroscience Departments and Programs* - Institutional Program members meet for a two-day program of speakers and panels addressing various aspects of neuroscience education and research.
- *Neuroscience Departments and Programs Reception* - Annual reception held at SfN's annual meeting for neuroscience departments and programs.
- *Award for Education in Neuroscience* - This award is given to an individual(s) in recognition of their outstanding contributions to research, education and a distinguished career in the neurosciences.
- *Neuroscience Departments and Programs Exhibit Booth* - SfN Institutional Program members are invited to

provide information/materials regarding their programs and departments at the SfN annual meeting. Please contact npd@sfn.org for information about promoting your department or program at the booth.

Back to top

Organizations and Resources

- *Association of American Medical Colleges Group on Graduate Research, Education, and Training (AAMC GREAT)* - The GREAT Group provides professional development to, and fosters the exchange of information and ideas among the faculty and administrative leaders of biomedical PhD, MD-PhD, and postdoctoral programs.
- *Faculty for Undergraduate Neuroscience (FUN)* - FUN is an international organization focused on neuroscience education and research at the undergraduate level.
- *Choosing a Program* - A student guide for help in choosing a neuroscience doctoral program.
- *Teaching Resources for Neuroscientists* - A list of syllabi and online resources for teachers.
- *Network of European Neuroscience Schools (NENS)* - NENS works within the formal structure of the Federation of European Neuroscience Societies (FENS) and offers a basis for communication between European neuroscience graduate programs.

Back to top

If you have questions about this committee or are an NDP Institutional Program member and would like to update your directory listing, please email ndp@sfn.org.

Society for Neuroscience | 1121 14th Street, Suite 1010 | Washington, DC 20005 | www.sfn.org

Institutional Program Membership

Member Benefits | Application and Renewal | Categories and Fees | Membership Brochure

Society for Neuroscience (SfN) Institutional Program (IP) membership is available to academic departments and programs that award an undergraduate major or advanced degree in neuroscience or a neuroscience-related discipline. A neuroscience program is defined as a formal program at any educational or research facility that includes pre- or postdoctoral trainees with a primary interest in scientific investigation of the nervous system. This may include a variety of administrative structures, including, but not limited to a subsection of a larger department, a separate department, or an interdepartmental program.

As a SfN IP member, your program/department will be included in the Directory of Neuroscience Training Programs on the SfN Web site. Each IP member may designate up to two official representatives for each membership year, and designate one as the primary contact person.

Renew Your IP Membership Now

Renew today to receive these benefits and more:

- A listing in the online searchable directory of neuroscience training programs
- Inclusion in a biennial survey of neuroscience training programs
- Reduced registration fee for the annual spring meeting

Member Benefits

SfN IP membership offers a variety of benefits to help promote the success of neuroscience and neuroscience-related departments and programs:

- A listing in the online searchable directory of neuroscience training programs
- Inclusion in a biennial survey of neuroscience training programs
- One free IP member e-mail notice or one-time access to the IP mailing list *(additional requests are $100 each)*
- One free e-mail blast to SfN's student members
- Reduced registration fee for the annual spring meeting
- Purchase one NeuroJobs posting and get the next one half-price
- Access to the Neuroscience Departments and Programs booth at the SfN annual meeting for displaying program brochures and information
- Undergraduate students affiliated with an IP member are eligible for travel awards to the SfN annual meeting
- IP member representatives can be nominated for service on the Committee on Neuroscience Departments and Programs

Application and Renewal

At this time, new IP membership applications are accepted only by mail. Please complete the New IP Membership Application Form.

Current IP members can renew their membership online at www.sfn.org/IPrenewal or by mail with the IP Renewal Form.

Forms should be mailed to SfN at:

Society for Neuroscience
1121 14th St NW
Suite 1010
Washington, DC 20005

Categories and Fees
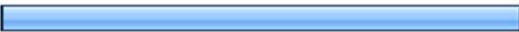
Graduate or Postdoctoral Programs: $285
Undergraduate Programs: $110
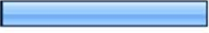
1. What degree will you earn?

		Response Percent	Response Count
Ph.D.		87.4%	485
M.D./Ph.D.		10.3%	57
M.S. Thesis		2.3%	13
M.S., non-thesis		0.0%	0
	answered question		555
	skipped question		0

2. Upon completion of your graduate training, what do you see as the next immediate step in your career path? (Check all that apply)

		Response Percent	Response Count
Getting a postdoctoral appointment		79.6%	442
Obtaining a faculty position at a college or university		20.0%	111
Going to medical school		8.3%	46
Going to law school		2.0%	11
Going back to graduate school in biomedical sciences		0.5%	3
Going to graduate school for an allied health profession		1.4%	8
Getting a job in industry or biotechnology		34.4%	191
Getting a job in government		20.5%	114
Other (please specify)		13.7%	76
	answered question		555
	skipped question		0

3. My graduate education has provided/is providing me with career management skills.

		Response Percent	Response Count
Strongly Agree		10.5%	58
Agree		45.2%	251
Neutral		25.6%	142
Disagree		14.6%	81
Strongly Disagree		4.1%	23
	answered question		555
	skipped question		0

4. Did you have an opportunity to teach?

		Response Percent	Response Count
Yes		73.0%	405
No		27.0%	150
	answered question		555
	skipped question		0

5. Would you have liked the opportunity to teach?
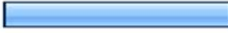
		Response Percent	Response Count
Yes		80.8%	122
No		19.2%	29
	answered question		151
	skipped question		404

6. Is teaching required by your program?

		Response Percent	Response Count
Yes		60.5%	250
No		39.5%	163
	answered question		413
	skipped question		142

7. Was your teaching part of a formal program or arranged informally?

		Response Percent	Response Count
Formal Program		61.8%	248
Arranged Informally		38.2%	153
	answered question		401
	skipped question		154
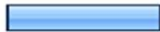
8. To what population did you teach? (Check all that apply)

		Response Percent	Response Count
Graduate Students (Masters level, class and/or lab)		32.4%	56
Graduate students (PhD level, class and/or lab)		64.2%	111
Graduate students (Professional studies - Nursing, Lab Animal Science, etc.)		7.5%	13
Medical students (class and/or lab)		38.7%	67
Physician Scientist Training program for high school students		2.9%	5
Other (please specify)			267
	answered question		173
	skipped question		382

9. Do you think a teaching requirement should be part of Ph.D. student training?

	Response Percent	Response Count
Yes	74.9%	408
No	25.1%	137
answered question		545
skipped question		10

10. While in my graduate program, I have strengthened my scientific writing skills
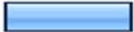
	Response Percent	Response Count
Strongly Agree	36.3%	198
Agree	48.4%	264
Neutral	10.6%	58
Disagree	4.2%	23
Strongly Disagree	0.5%	3
answered question		546
skipped question		9

11. Does your program offer a mandatory course in scientific writing?

	Response Percent	Response Count
Yes	17.6%	96
No	82.4%	450
answered question		546
skipped question		9

12. Was the mandatory scientific writing course helpful?

		Response Percent	Response Count
Yes		81.9%	77
No		18.1%	17
	answered question		94
	skipped question		461

13. Should scientific writing be a mandatory part of graduate student training?

		Response Percent	Response Count
Yes		80.7%	436
No		19.3%	104
	answered question		540
	skipped question		15

Page 1, Q2. Upon completion of your graduate training, what do you see as the next immediate step in your career path? (Check all that apply)

1	Medical Residency Program	Mar 20, 2012 10:22 PM
2	Education / outreach	Mar 20, 2012 3:39 PM
3	residency	Mar 20, 2012 10:14 AM
4	I will be FINISHING medical school as a dual degree student	Mar 20, 2012 8:09 AM
5	Job in Healthcare - Clinical Research	Mar 19, 2012 3:22 PM
6	Complete Residency	Mar 19, 2012 2:59 PM
7	Non-Science Related Job	Mar 16, 2012 10:11 AM
8	No Future	Mar 15, 2012 12:46 PM
9	Residence Training	Mar 15, 2012 12:30 PM
10	Editor or science writing job maybe	Mar 14, 2012 9:27 PM
11	Going to business school	Mar 14, 2012 6:38 PM
12	Policy position	Mar 12, 2012 4:54 PM
13	continue working in industry and to also consider adjunct professor position	Mar 11, 2012 8:03 AM
14	residency	Mar 11, 2012 1:52 AM
15	teaching high school	Mar 9, 2012 5:11 PM
16	Getting a job in an NGO	Mar 9, 2012 11:54 AM
17	residency program/postdoc	Mar 8, 2012 8:29 PM
18	Fulbright or PeaceCorps	Mar 8, 2012 6:38 PM
19	Going for residency	Mar 8, 2012 5:53 PM
20	Working in science outreach	Mar 8, 2012 4:40 PM
21	Post-doc with teaching opportunities available	Mar 8, 2012 4:12 PM
22	Health Care	Mar 8, 2012 1:54 PM
23	break for some world travel, during break assess career direction, if continuing career decide on postdoctoral appointment or job in industry	Mar 8, 2012 1:47 PM
24	Medical residency	Mar 8, 2012 1:43 PM
25	Publishing	Mar 8, 2012 1:03 PM
26	scientific journal editor	Mar 8, 2012 12:39 PM

27	taking a teaching position at a university	Mar 8, 2012 12:28 PM
28	teaching, writing	Mar 8, 2012 12:21 PM
29	Work in business, project management, freelance consulting	Mar 8, 2012 12:04 PM
30	Unsure	Mar 8, 2012 11:48 AM
31	teaching	Mar 8, 2012 12:11 AM
32	Returning to medical school and completing a residency	Mar 7, 2012 8:57 PM
33	Write or start my own business	Mar 7, 2012 8:06 PM
34	residency	Mar 7, 2012 7:28 PM
35	Teaching Postdoctoral Fellowship	Mar 7, 2012 7:14 PM
36	Teaching at the High School/Community College level - not necessarily in neuroscience.	Mar 7, 2012 6:57 PM
37	Residency training	Mar 7, 2012 6:13 PM
38	Medical Residency Training/Research Associate Position	Mar 7, 2012 5:33 PM
39	High school science teacher or job doing curriculum development	Mar 7, 2012 5:31 PM
40	doing a residency program and research fellowship	Mar 7, 2012 5:25 PM
41	Research Assistant in different field	Mar 7, 2012 5:18 PM
42	Looking for a career in outreach/science writing	Mar 7, 2012 5:15 PM
43	Residency with protected research time	Mar 7, 2012 5:05 PM
44	unsure	Mar 7, 2012 4:39 PM
45	private practice medicine	Mar 7, 2012 4:22 PM
46	Going to Residency	Mar 7, 2012 4:00 PM
47	possibly non-research related teaching/scientific outreach	Mar 7, 2012 3:56 PM
48	having children and becoming a housewife	Mar 7, 2012 3:45 PM
49	Residency in Neurology/Radiology/Ophthalmology	Mar 7, 2012 3:33 PM
50	Completing medical school and residency	Mar 7, 2012 3:33 PM
51	Fellowship in Science Policy	Mar 7, 2012 3:23 PM
52	gettign a teaching position at a undergradate college	Mar 7, 2012 3:09 PM

Page 1, Q2. Upon completion of your graduate training, what do you see as the next immediate step in your career path? (Check all that apply)

53	Residency Position	Mar 7, 2012 3:04 PM
54	Informal Science Education	Mar 7, 2012 2:44 PM
55	teaching	Mar 7, 2012 2:39 PM
56	getting a job in another field	Mar 7, 2012 2:32 PM
57	Teaching	Mar 7, 2012 2:31 PM
58	Residency / post-graduate medical training	Mar 7, 2012 2:30 PM
59	Residency (neurosurgery)	Mar 7, 2012 2:29 PM
60	Residency	Mar 7, 2012 2:27 PM
61	Residency	Mar 7, 2012 2:20 PM
62	Business of biomedical industry	Mar 7, 2012 2:19 PM
63	PhD in Neuroscience	Mar 7, 2012 2:10 PM
64	course organizer/teacher of some sort, administrative in the sciences	Mar 7, 2012 2:08 PM
65	Lecturer at a liberal arts or teaching college	Mar 7, 2012 1:56 PM
66	Job/internship in science writing	Mar 7, 2012 1:35 PM
67	M.D. Residency	Mar 7, 2012 1:19 PM
68	Alternative career options should be available as "backup"	Mar 7, 2012 12:50 PM
69	considering a Masters in Public Policy	Mar 7, 2012 12:43 PM
70	obtaining a job that will afford me more teaching experience	Mar 7, 2012 12:33 PM
71	expanding my teaching experience to become eligible for a desirable faculty position	Mar 7, 2012 11:31 AM
72	Teaching at High School	Mar 7, 2012 11:31 AM
73	Getting as far away from the circle jerk of academia as possible.	Mar 7, 2012 11:05 AM
74	getting a MBA/engineering MS combo	Mar 7, 2012 10:43 AM
75	Getting teaching experience through adjunct positions	Mar 7, 2012 10:00 AM
76	I'm also considering public policy school or a commission in the Navy	Mar 7, 2012 9:24 AM

Page 3, Q8. To what population did you teach? (Check all that apply)		
1	Had the opportunity to teach but chose not to do so.	Mar 20, 2012 10:23 PM
2	undergraduates	Mar 20, 2012 1:45 PM
3	undergraduate level	Mar 20, 2012 11:01 AM
4	undergrads	Mar 20, 2012 10:16 AM
5	none	Mar 20, 2012 10:14 AM
6	Undergraduates	Mar 20, 2012 9:17 AM
7	undergraduate students	Mar 20, 2012 9:15 AM
8	Undergraduate students	Mar 20, 2012 8:22 AM
9	Undergraduates	Mar 19, 2012 8:04 PM
10	Undergraduates	Mar 19, 2012 1:06 PM
11	Undergraduates	Mar 19, 2012 12:23 PM
12	Undergraduate students	Mar 19, 2012 12:18 PM
13	Undergraduate Students	Mar 19, 2012 11:18 AM
14	Middle School students	Mar 19, 2012 10:55 AM
15	undergraduate students, lab	Mar 16, 2012 3:21 PM
16	Undergraduates	Mar 16, 2012 2:57 PM
17	undergraduate neuroscience	Mar 16, 2012 10:27 AM
18	undergraduate students	Mar 15, 2012 9:34 AM
19	Undergraduates	Mar 14, 2012 5:32 PM
20	Undergraduates	Mar 14, 2012 2:58 PM
21	undergraduate students- cell and molecular biology	Mar 14, 2012 1:23 PM
22	Undergraduate students	Mar 14, 2012 1:22 PM
23	undergraduate students	Mar 13, 2012 7:20 PM
24	Undergraduates	Mar 13, 2012 3:16 PM
25	TA for college students	Mar 12, 2012 9:08 PM
26	Undergrads	Mar 12, 2012 9:06 PM
27	undergraduates	Mar 12, 2012 8:32 PM

Page 3, Q8. To what population did you teach? (Check all that apply)		
28	undergraduate students	Mar 12, 2012 6:21 PM
29	TA for undergraduates	Mar 12, 2012 5:41 PM
30	Undergraduate students	Mar 12, 2012 5:16 PM
31	Undergraduate students	Mar 12, 2012 5:15 PM
32	undergraduates	Mar 12, 2012 5:11 PM
33	Undergraduates	Mar 12, 2012 5:03 PM
34	Undergraduate students	Mar 12, 2012 4:57 PM
35	undergraduates	Mar 12, 2012 4:54 PM
36	Undergraduate students	Mar 12, 2012 4:50 PM
37	Undergraduates	Mar 12, 2012 4:46 PM
38	Undergraduates and elementary school/middle school	Mar 12, 2012 1:48 PM
39	undergraduates	Mar 12, 2012 11:36 AM
40	undergraduate students	Mar 12, 2012 10:54 AM
41	undergraduate students	Mar 12, 2012 10:35 AM
42	undergraduates	Mar 12, 2012 10:34 AM
43	undergraduates	Mar 12, 2012 10:32 AM
44	undergraduate students	Mar 11, 2012 9:00 PM
45	Undergraduates	Mar 11, 2012 7:03 PM
46	undergaduates	Mar 11, 2012 8:05 AM
47	undergraduates	Mar 11, 2012 12:45 AM
48	undergraduates	Mar 9, 2012 5:33 PM
49	under graduate	Mar 9, 2012 5:11 PM
50	undergraduate students	Mar 9, 2012 3:59 PM
51	Undergraduate students	Mar 9, 2012 2:17 PM
52	undergraduates	Mar 9, 2012 2:08 PM
53	Undergraduate in premed	Mar 9, 2012 1:36 PM
54	Undergraduate students	Mar 9, 2012 11:30 AM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
55	Undergraduates	Mar 9, 2012 11:12 AM
56	Undergraduates	Mar 9, 2012 9:01 AM
57	undergraduates	Mar 8, 2012 9:41 PM
58	undergraduates	Mar 8, 2012 9:32 PM
59	Undergraduates	Mar 8, 2012 8:15 PM
60	Undergraduate, Neuroscience Majors	Mar 8, 2012 7:40 PM
61	Undergraduate students	Mar 8, 2012 6:39 PM
62	undergraduate students	Mar 8, 2012 6:10 PM
63	Undergraduates	Mar 8, 2012 5:30 PM
64	Undergraduate students	Mar 8, 2012 5:20 PM
65	Undergraduates	Mar 8, 2012 4:41 PM
66	Undergraduate Students	Mar 8, 2012 4:40 PM
67	undergraduates	Mar 8, 2012 4:30 PM
68	undergraduate	Mar 8, 2012 4:18 PM
69	Undergraduates	Mar 8, 2012 4:12 PM
70	undergraduates	Mar 8, 2012 4:10 PM
71	Undergraduate	Mar 8, 2012 3:56 PM
72	undergraduate lab	Mar 8, 2012 3:53 PM
73	Undergrads	Mar 8, 2012 3:41 PM
74	Undergraduate students, class	Mar 8, 2012 3:31 PM
75	Undergraduate Students	Mar 8, 2012 3:11 PM
76	Undergraduate students	Mar 8, 2012 2:58 PM
77	Undergraduates	Mar 8, 2012 2:34 PM
78	undergraduate students	Mar 8, 2012 2:04 PM
79	Undergraduates	Mar 8, 2012 1:43 PM
80	Undergraduates	Mar 8, 2012 1:42 PM
81	will teach... have not taught yet.	Mar 8, 2012 1:36 PM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
82	Undergraduates	Mar 8, 2012 1:30 PM
83	high school curriculim development	Mar 8, 2012 1:23 PM
84	i would teach to undergrads	Mar 8, 2012 1:20 PM
85	undergraduates	Mar 8, 2012 12:40 PM
86	undergraduates	Mar 8, 2012 12:28 PM
87	undergraduate students (lab)	Mar 8, 2012 12:26 PM
88	undergraduates	Mar 8, 2012 12:15 PM
89	Undergrad students	Mar 8, 2012 12:07 PM
90	undergard	Mar 8, 2012 12:06 PM
91	undergraduates	Mar 8, 2012 11:43 AM
92	Undergraduate	Mar 8, 2012 11:17 AM
93	Undergraduate Students (Lab)	Mar 8, 2012 11:15 AM
94	Undergraduate students	Mar 8, 2012 11:11 AM
95	undergraduate students	Mar 8, 2012 10:43 AM
96	Undergraduate students (lab)	Mar 8, 2012 1:59 AM
97	undergraduate, high school (in class)	Mar 8, 2012 12:12 AM
98	Undergrad	Mar 7, 2012 9:59 PM
99	Undergrads	Mar 7, 2012 9:39 PM
100	undergraduates	Mar 7, 2012 9:03 PM
101	Undergraduate upper-level science majors	Mar 7, 2012 8:58 PM
102	Undergraduate students (class/lab)	Mar 7, 2012 8:24 PM
103	undergraduates	Mar 7, 2012 7:44 PM
104	We are required to TA two classes during our graduate program, but teaching isn't necessarily invloved.	Mar 7, 2012 7:35 PM
105	Undergraduates and High School Students	Mar 7, 2012 7:16 PM
106	Undergraduates	Mar 7, 2012 6:57 PM
107	Undergraduates majoring in neurobiology	Mar 7, 2012 6:47 PM
108	Undergraduates	Mar 7, 2012 6:35 PM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
109	undergraduates	Mar 7, 2012 6:28 PM
110	Middle school students only. Haven't yet had a chance to teach a real class here.	Mar 7, 2012 6:16 PM
111	Not yet performed	Mar 7, 2012 6:09 PM
112	Undergraduates	Mar 7, 2012 5:56 PM
113	undergraduates	Mar 7, 2012 5:47 PM
114	undergraduate class	Mar 7, 2012 5:43 PM
115	Undergraduate	Mar 7, 2012 5:39 PM
116	Undergraduates (pre-med students)	Mar 7, 2012 5:39 PM
117	upper level undergraduate course	Mar 7, 2012 5:35 PM
118	Undergraduate	Mar 7, 2012 5:32 PM
119	undergraduate students	Mar 7, 2012 5:31 PM
120	undergrads	Mar 7, 2012 5:29 PM
121	Undergraduates	Mar 7, 2012 5:26 PM
122	Undergraduates, High School	Mar 7, 2012 5:18 PM
123	Undergraduates	Mar 7, 2012 5:18 PM
124	Undergraduates	Mar 7, 2012 5:15 PM
125	Undergraduate students	Mar 7, 2012 5:15 PM
126	Undergraduates	Mar 7, 2012 5:07 PM
127	Undergraduates	Mar 7, 2012 5:05 PM
128	Upper Level Undergraduate Neuroscience	Mar 7, 2012 5:04 PM
129	Undergraduate students	Mar 7, 2012 5:03 PM
130	Undergraduates	Mar 7, 2012 5:03 PM
131	Undergraduate neuroscience course	Mar 7, 2012 5:03 PM
132	Undergraduates	Mar 7, 2012 4:58 PM
133	Undergraduate students	Mar 7, 2012 4:43 PM
134	undergraduates	Mar 7, 2012 4:40 PM
135	Undergraduates	Mar 7, 2012 4:37 PM

Page 3, Q8. To what population did you teach? (Check all that apply)		
136	undergraduates	Mar 7, 2012 4:33 PM
137	Middle School Students	Mar 7, 2012 4:33 PM
138	And undergraduates	Mar 7, 2012 4:13 PM
139	undergraduates at another university	Mar 7, 2012 4:08 PM
140	undergraduate psychology classes	Mar 7, 2012 4:05 PM
141	undergraduates	Mar 7, 2012 4:04 PM
142	undergraduate student	Mar 7, 2012 4:03 PM
143	undergraduate	Mar 7, 2012 4:03 PM
144	Undergraduates	Mar 7, 2012 4:01 PM
145	undergraduate students (lab)	Mar 7, 2012 3:57 PM
146	Undergraduate students	Mar 7, 2012 3:53 PM
147	undergraduates	Mar 7, 2012 3:46 PM
148	Undergraduate Neuroscience Majors	Mar 7, 2012 3:44 PM
149	Undergraduates	Mar 7, 2012 3:41 PM
150	Teaching within the community, tutoring middle school students, etc.	Mar 7, 2012 3:33 PM
151	Undergraduates	Mar 7, 2012 3:32 PM
152	Postdocs	Mar 7, 2012 3:20 PM
153	Undergraduates	Mar 7, 2012 3:19 PM
154	Not yet determined	Mar 7, 2012 3:17 PM
155	undergraduate students	Mar 7, 2012 3:17 PM
156	undergraduate	Mar 7, 2012 3:16 PM
157	Middle school	Mar 7, 2012 3:13 PM
158	undergraduates	Mar 7, 2012 3:13 PM
159	undergrad psychology	Mar 7, 2012 3:12 PM
160	undergraduates	Mar 7, 2012 3:10 PM
161	Undergraduates	Mar 7, 2012 3:05 PM
162	undergraduate students	Mar 7, 2012 3:02 PM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
163	undergraduate teaching assistant	Mar 7, 2012 3:00 PM
164	Undergraduate Students	Mar 7, 2012 2:56 PM
165	undergraduate students	Mar 7, 2012 2:56 PM
166	undergraduates	Mar 7, 2012 2:53 PM
167	Undergraduate Psychology Students	Mar 7, 2012 2:47 PM
168	undergraduates	Mar 7, 2012 2:40 PM
169	Undergraduate class	Mar 7, 2012 2:39 PM
170	Undergraduates	Mar 7, 2012 2:39 PM
171	Undergraduates	Mar 7, 2012 2:36 PM
172	undergraduate students	Mar 7, 2012 2:33 PM
173	Undergrads	Mar 7, 2012 2:31 PM
174	i'll teach (TA) next year	Mar 7, 2012 2:31 PM
175	Undergrads	Mar 7, 2012 2:30 PM
176	Undergraduate students, high school volunteer	Mar 7, 2012 2:30 PM
177	Physical therapy students	Mar 7, 2012 2:24 PM
178	undergraduate students	Mar 7, 2012 2:23 PM
179	Undergrduate Science Majors	Mar 7, 2012 2:21 PM
180	undergraduates	Mar 7, 2012 2:19 PM
181	undergraduates	Mar 7, 2012 2:16 PM
182	Undergraduate Students	Mar 7, 2012 2:15 PM
183	elementary, middle school, high school, undergrads	Mar 7, 2012 2:13 PM
184	Undergraduate students	Mar 7, 2012 2:12 PM
185	Undergraduates	Mar 7, 2012 2:08 PM
186	Undergraduates	Mar 7, 2012 2:04 PM
187	Undergraduates	Mar 7, 2012 1:57 PM
188	Undergraduates	Mar 7, 2012 1:57 PM
189	undergraduates	Mar 7, 2012 1:41 PM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
190	Undergraduates	Mar 7, 2012 1:39 PM
191	undergraduate	Mar 7, 2012 1:30 PM
192	undergrad students	Mar 7, 2012 1:30 PM
193	Program for Middle school kids	Mar 7, 2012 1:28 PM
194	Undergraduate Students	Mar 7, 2012 1:27 PM
195	undergraduates	Mar 7, 2012 1:24 PM
196	undergrads	Mar 7, 2012 1:21 PM
197	Undergraduates	Mar 7, 2012 1:21 PM
198	Undergraduate students, lab	Mar 7, 2012 1:21 PM
199	Undergraduate students	Mar 7, 2012 1:19 PM
200	post docs	Mar 7, 2012 1:15 PM
201	Undergraduate students	Mar 7, 2012 1:13 PM
202	undergrads	Mar 7, 2012 1:11 PM
203	Undergraduates	Mar 7, 2012 1:08 PM
204	Undergraduate students	Mar 7, 2012 1:05 PM
205	Undergraduate students	Mar 7, 2012 1:05 PM
206	Undergraduates	Mar 7, 2012 1:00 PM
207	undergraduate students (non-science majors)	Mar 7, 2012 12:56 PM
208	Undergraduates	Mar 7, 2012 12:56 PM
209	Undergraduates	Mar 7, 2012 12:50 PM
210	undergrad	Mar 7, 2012 12:50 PM
211	Undergraduate students	Mar 7, 2012 12:50 PM
212	Undergraduate	Mar 7, 2012 12:49 PM
213	Undergraduate Students	Mar 7, 2012 12:47 PM
214	Undergraduates	Mar 7, 2012 12:37 PM
215	undergrads	Mar 7, 2012 12:36 PM
216	Undergraduates (pre-med)	Mar 7, 2012 12:33 PM

Page 3, Q8. To what population did you teach? (Check all that apply)		
217	Undergraduates	Mar 7, 2012 12:31 PM
218	undergraduates	Mar 7, 2012 12:30 PM
219	Undergraduate class with lab/recitation	Mar 7, 2012 12:29 PM
220	Undergraduate Students	Mar 7, 2012 12:28 PM
221	Undergraduate students	Mar 7, 2012 12:28 PM
222	Undergraduate Students	Mar 7, 2012 12:27 PM
223	Undergraduates	Mar 7, 2012 12:26 PM
224	Undergraduates	Mar 7, 2012 12:26 PM
225	Undergraduate students	Mar 7, 2012 12:25 PM
226	Undergraduate Students	Mar 7, 2012 12:24 PM
227	undergraduates	Mar 7, 2012 12:23 PM
228	undergraduates	Mar 7, 2012 12:12 PM
229	Undergraduates, High School students in a summer program	Mar 7, 2012 11:55 AM
230	Undergraduates	Mar 7, 2012 11:52 AM
231	undergrads, high schoolers	Mar 7, 2012 11:52 AM
232	undergraduates	Mar 7, 2012 11:44 AM
233	Undergraduate	Mar 7, 2012 11:44 AM
234	High school students through an outreach program	Mar 7, 2012 11:42 AM
235	Undergraduates	Mar 7, 2012 11:41 AM
236	Undergraduate students	Mar 7, 2012 11:38 AM
237	Undergraduate Students	Mar 7, 2012 11:37 AM
238	Undergraduates	Mar 7, 2012 11:33 AM
239	elementary, middle, and high school students	Mar 7, 2012 11:32 AM
240	Undergraduates	Mar 7, 2012 11:31 AM
241	undergraduates (laboratory and lecture TAs)	Mar 7, 2012 11:31 AM
242	Undergraduate	Mar 7, 2012 11:27 AM
243	undergrads, K-12	Mar 7, 2012 11:21 AM

	Page 3, Q8. To what population did you teach? (Check all that apply)	
244	Undergraduate students	Mar 7, 2012 11:19 AM
245	Undergraduate biology non-majors and Undergraduate Neuroscience majors	Mar 7, 2012 11:19 AM
246	undergrads	Mar 7, 2012 11:18 AM
247	undergraduates	Mar 7, 2012 11:16 AM
248	undergraduate students	Mar 7, 2012 11:15 AM
249	undergrads	Mar 7, 2012 11:12 AM
250	Undergraduates	Mar 7, 2012 11:12 AM
251	Undergrads	Mar 7, 2012 11:07 AM
252	Undergraduates	Mar 7, 2012 11:05 AM
253	Undergraduates	Mar 7, 2012 10:52 AM
254	undergraduates	Mar 7, 2012 10:45 AM
255	undergraduates	Mar 7, 2012 10:43 AM
256	Undergraduates	Mar 7, 2012 10:38 AM
257	Undergraduate students	Mar 7, 2012 10:18 AM
258	Undergraduate students	Mar 7, 2012 10:11 AM
259	Undergraduate lectures	Mar 7, 2012 10:10 AM
260	Undergraduates	Mar 7, 2012 10:06 AM
261	Undergraduate students, Medical Residents in Training	Mar 7, 2012 10:01 AM
262	Undergraduate students	Mar 7, 2012 9:50 AM
263	Undergraduates	Mar 7, 2012 9:48 AM
264	Undergraduates	Mar 7, 2012 9:45 AM
265	Undergraduates - an obvious choice that you didn't offer	Mar 7, 2012 9:25 AM
266	Undergraduate students (how is this not even an option)	Mar 7, 2012 8:32 AM
267	Undergraduate students, I also taught high school	Mar 7, 2012 7:57 AM

Survival Analysis of Faculty Retention in Science and Engineering by Gender

Deborah Kaminski*, et al.*
Science **335**, 864 (2012);
DOI: 10.1126/science.1214844

Survival Analysis of Faculty Retention in Science and Engineering by Gender

Deborah Kaminski[1]* and Cheryl Geisler[2]

Individual assistant professors (a total of 2966 faculty) hired in science and engineering since 1990 at 14 United States universities were tracked from time of hire to time of departure by using publicly available catalogs and bulletins. Results of survival analysis showed that the chance that any given faculty member will be retained over time is less than 50%; the median time to departure is 10.9 years. Of all those who enter as assistant professors, 64.2% were promoted to associate professor at the same institution. Overall, men and women are retained and promoted at the same rate. In mathematics, however, faculty leave significantly earlier than other disciplines, and women leave significantly sooner than men, 4.45 years compared with 7.33 years.

U.S. universities are concerned about faculty retention in science and engineering (1–4). When a faculty member leaves prematurely, they suffer disruptions in teaching and mentoring as well as significant economic losses (1). Start-up costs in engineering and natural sciences can range from $110,000 to nearly $1.5 million (3), and it may take up to 10 years to recoup this investment (4).

Retention rates for faculty in the United States have been consistent. From 1971 through 1989, faculty members were retained at rates of 90 to 92% for associate and full professors and 84 to 86% for assistant professors (5). In 1996–1997 and 2001–2002, the retention rates for associate professors were again in the range of 90 to 92% (6).

Problems with the retention of women in science and engineering in the United States have been well documented. Like a leaky pipeline, each career stage in engineering and the natural sciences shows the retention of women lower than the stage before it (3, 7). In particular, although women are increasingly represented among those with earned doctorates, they lag behind in representation in the academic faculties (8).

The problem appears to lie in differential application rates. Once women apply for or are in consideration for a career move, they are equally likely to succeed, but they are often not in the pool (3, 9–11). Men have been found to be significantly more likely to receive tenure or move to positions outside of academia, whereas women are significantly more likely to be unemployed or to exit the tenure track for adjunct positions (3). Women with Ph.D.s in science, technology, engineering, and mathematics (STEM) disciplines have also been found to be less likely than men to be employed full time, although equally likely to succeed if they apply (11).

Women have also been shown to have greater intentions to leave the STEM disciplines (12), although not academia as a whole (13), and to leave for different reasons. Whereas salary is the number one reason for men, women cite more interpersonal and family reasons (14, 15). Delays in tenure resulting in lower salaries could account for women leaving before tenure (16), but department climate is a primary reason why women are less satisfied and more likely to quit (4).
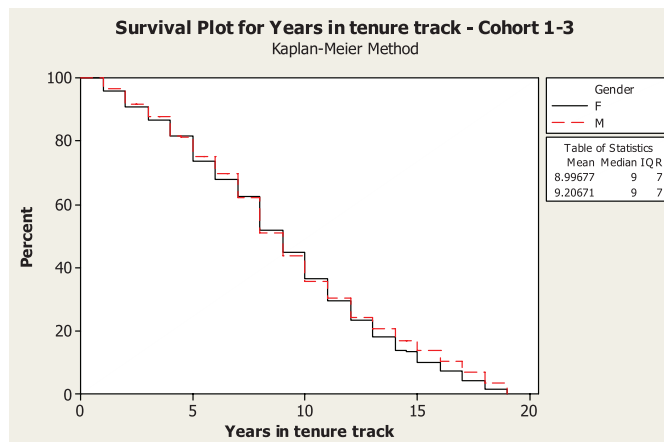
Significant disciplinary variations exist in the retention of women in science and engineering. In the disciplines included in this study, the rate of growth in earned doctorates, the level of representation in the pool of Ph.D.s, and representation in the ranks of assistant professors all showed marked disciplinary differences between men and women (8). At research I universities in six of the nine fields included in this study, the mean percentage of those who applied, were interviewed for, and were made offers to was closer to the percentage of women in the relevant doctoral pool for electrical engineering, mathematics, and physics, where their representation was lowest, than in chemistry and biology, where their representation in the pool was highest (11).

Women's representation among earned doctorates is particularly high in the biological sciences (8). Between 1972 and 1991, representations of women in all levels of academics was highest for life sciences and lowest for engineering, with physical science in between (9). The probability of having a tenure-track position 10 years after Ph.D. is significantly smaller for women in the life sciences but about the same for those in physical and engineering sciences (9). In the biological and life sciences, where women are most heavily represented, they have an 8 to 9% less chance of getting a tenure-track job, getting tenure, or getting promoted to full professor (9). In terms of retention, one study reports that women and minority faculty have higher turnover intentions in the pure and applied life sciences as well as in the pure physical sciences, but not in the applied science areas that include the engineering fields (1).

In this study, we tracked 2966 science and engineering faculty from 14 universities from time of hire to the time they left the university. All data were obtained from publicly available

Fig. 1. Nonparametric survival curve for faculty who entered between 1990 and 2002 by gender. IQR, interquartile range.

Survival Plot for Years in tenure track - Cohort 1-3
Kaplan-Meier Method

	Gender
——	F
– – –	M

Table of Statistics		
Mean	Median	IQR
8.99677	9	7
9.20671	9	7

[1]Department of Mechanical, Aerospace, and Nuclear Engineering, Rensselaer Polytechnic Institute, Troy, NY 12180, USA. [2]Faculty of Communication, Art, and Technology, Simon Fraser University, Harbour Centre 7410, 515 West Hastings Street, Vancouver, BC V6B 5K5, Canada.

*To whom correspondence should be addressed. E-mail: kamind@rpi.edu

108

college catalogs and bulletins (17). We divided our sample into five cohorts, beginning with those who entered from 1990 to 1993 and ending with those entering from 2006 to 2009. The sample size and composition of each cohort can be found in table S1. The question of retention was examined by using the first three cohorts, who arrived between 1990 and 2002 (18), as specified in table S2.

Figure 1 shows the Kaplan-Meier survival curve for cohorts 1 to 3. Large declines appear at years 5, 8, and 10; there is no significant difference between men and women. The data are correlated in Fig. 2, which includes parametric survival curves, probability density functions, and hazard functions. A log normal distribution provided the best fit to data, with a correlation coefficient of 0.983. The probability density function shows that departure rates are higher in the first 10 years. In the first 3 years, departure rates are somewhat lower, whereas in the next 3 years, departure rates are high. The survival function shows a rather steeper decline in faculty at early times and a more moderate descent at later times. It is apparent that posttenure faculty leave at a lower rate than pretenure faculty. The hazard function tells a similar story. This is the rate of attrition at a given point in a faculty career, and it peaks at about 6 years. The differences between men and women are small.

Table 1 gives the median time to departure for cohorts 1 to 3 by gender. Half of all entering faculty have departed by 10.9 years. There is no statistically significant difference between men and women. The 95% confidence intervals (CIs) on the median for men and women are nearly coincident.

Another perspective on faculty retention is available by examining promotion rates. The percentage of faculty in the first two cohorts who were promoted to associate professor is given in table S3. For the full population of 1032 faculty, 64.2% ± 3.65% were promoted to associate professor. There is no significant variation by cohort or by gender. For the first cohort, the average number of years to promotion to full professor was 10.73 for men and 10.91 for women.

These results give a broad view of parity between men and women in the areas of retention and promotion, consistent with several other studies (1, 11). Women on the whole are less satisfied than men (15, 19), but this dissatisfaction does not manifest as increased rates of departure.

There was no significant change in retention patterns from 1990 to 2002. There has been a substantial increase in the percentage of women hired into STEM faculty positions since 1990, as shown in fig. S1. These two facts together imply an increased presence of women in STEM departments over the long run. Those who are hired tend to stay, and the number hired is increasing. The time constant for the change in department gender composition is, however, very long.

Although there are no significant differences in retention by gender for the entire population, there are some disciplinary variations. Table 2 lists the median time to exit for men and women by discipline. A log-rank and Wilcoxon test for significant difference between two survival curves (20) shows no differences except in the case of mathematics, where $P = 0.0522$ and 0.008, respectively. Because of the choice of weighting function, the log-rank test puts more emphasis on differences at long times, and the Wilcoxon puts more emphasis on differences at short times. A Cox proportional hazards model was used to detect differences among disciplines regardless of gender. Two disciplines were significantly different. In mechanical engineering, facul-

ty leave later than those in other disciplines ($P = 0.0006$), but gender differences are not significant. In mathematics, by contrast, faculty leave earlier than those in other disciplines ($P < 0.0001$), and the difference between men and women is stark. The median for men is 7.33 years, and the median for women is 4.45 years.

The Kaplan-Meier survival curve for mathematics faculty is presented in Fig. 3. Women leave at a significantly greater rate than men, including a dramatic decline at 5 years. The data were correlated with a log normal function, as shown in fig. S2. There is little overlap in the 95% confidence intervals for the men and women, indicating statistically significant differences. The correlation coefficients of 0.967 and 0.975 are high. The probability density function, the survival function, and the hazard function for mathematics faculty are given in fig. S3. The probability density function shows that women are much more likely to leave very soon after hiring than are men. This results in a survival curve in which very few women persist to the 20-year mark.
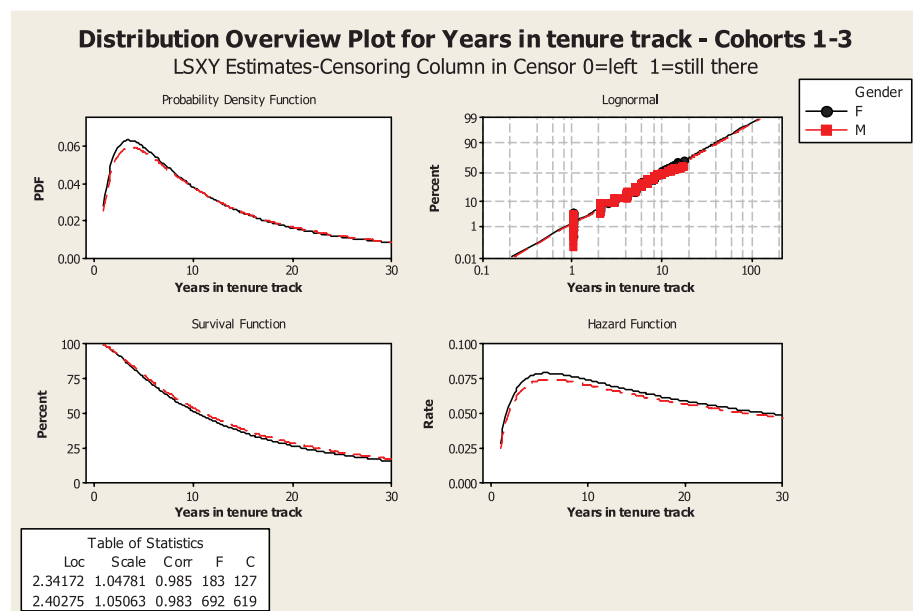
Previous large-scale analyses of the retention of academic faculty in the United States have relied on aggregate data or surrogate variables to track year-to-year turnover in STEM disciplines. The large-scale analysis reported here, which tracked the retention of individual faculty across time, confirmed some of the earlier results but points to new areas of concern. Although the use of college catalogs and bulletins as a data source is time-intensive, previous work has made the case for the value of using publicly available sources to monitor institutional change (21).

An early study based on American Association of University Professors data (5) found average attrition rates of 0.15 for assistant professors and 0.08 for associate professors. The values for assistant professors are much higher than our hazard function values, indicating that retention of assistant professors may have improved since 1990. In a more recent study (6), the attrition rates for all associate professors averaged 0.077. From our data, the hazard function at 10 years (representative of associate professors) was 0.0709, and at 8.5 years it was 0.073, consistent with the two earlier studies.

Our work confirms the importance of the late pretenure period as a period of critical risk in the retention of faculty in STEM. Like earlier analyses, we find that posttenure faculty members are overall less likely to depart than pretenure faculty. Overall, the chances that any

Distribution Overview Plot for Years in tenure track - Cohorts 1-3

LSXY Estimates-Censoring Column in Censor 0=left 1=still there

Table of Statistics				
Loc	Scale	Corr	F	C
2.34172	1.04781	0.985	183	127
2.40275	1.05063	0.983	692	619

Fig. 2. Survival analysis of faculty who entered between 1990 and 2002 by gender. LSXY, least squares; F, number that left; C, number still remaining.

Table 1. Median times to exit the tenure track by gender, cohorts 1 to 3.

	Median time to exit, years	95% Normal CI	
		Lower	Upper
All	10.94	10.3	11.61
Men	11.05	10.34	11.81
Women	10.40	9.094	11.89

Table 2. Median times to exit the tenure track by gender and discipline for cohorts 1 to 3. CIs are for medians.

Discipline	Median years men	Lower 95% CI	Upper 95% CI	Median years women	Lower 95% CI	Upper 95% CI	P log rank test	P Wilcoxon test
Elec Eng	12.92	10.51	15.88	10.68	6.49	17.59	0.641	0.576
Physics	11.14	9.00	13.79	9.41	6.61	13.40	0.118	0.739
Mech Eng	16.19	12.80	20.46	10.41	7.10	15.24	0.109	0.153
Chemistry	12.46	10.07	15.41	10.53	7.57	14.64	0.980	0.847
Math	7.33	6.20	8.68	4.45	3.34	5.93	0.0522	0.0083
Comp Sci	9.32	7.64	11.39	10.25	6.87	15.28	0.5156	0.548
Civil Eng	8.68	7.01	10.76	10.74	7.48	15.43	0.970	0.262
Biology	11.96	9.30	15.37	16.36	9.20	29.10	0.0664	0.197
Chem Eng	11.64	9.00	15.05	9.78	5.95	16.08	0.393	0.687

Fig. 3. Kaplan-Meier survival plot for mathematics faculty by gender, cohorts 1 to 3.
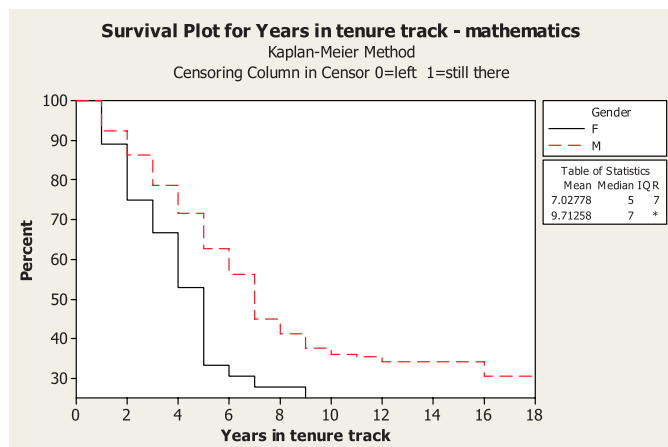
Survival Plot for Years in tenure track - mathematics
Kaplan-Meier Method
Censoring Column in Censor 0=left 1=still there

given faculty member will be retained over time is less than 50%; the median time to departure is 10.9 years. These retention data are rather stable over the 12-year period studied and may be resistant to change. Further work will need to be done to establish how much of this mobility results from the pull of better opportunities or the push of concern over tenure and how much results in a decision to leave the tenure track or the academic sector altogether.

Given the high economic and institutional costs of failures to retain, these low retention rates represent a substantial burden on institutions of higher education. Universities must be prepared to replace departing faculty and must plan for the high cost of start-up packages. If a university expects to grow its faculty, it has an even greater challenge. Simply staying the same size requires considerable hiring and mentoring, even without considering retirement.

The lack of gender effects in retention and promotion in our data is good news and confirms the patterns found in recent aggregate and indirect analyses (1, 3). For all STEM disciplines considered together, the percentage of women hired is lower than men, but the retention rates are comparable. This indicates that, if the women are hired, they will likely persist and that recruitment is a more pressing issue than retention in achieving gender parity. However, the long span of faculty careers provides considerable inertia in the system. Marschke *et al.* (22) estimate

that it would take about 40 years for a department to match the gender composition of the hiring pool because of the long length of faculty careers. Although our data do show an increase in percentage of women hired, the goal of 50% women may not be achieved until as late as 2050. Thus, if current trends continue, it may take 100 years before women are 50% of the faculty in STEM departments.

In our data, the discipline of mathematics stands out in two ways with respect to retention. First, it has the quickest departure rates in any discipline we studied. Second, there are statistically significant differences in the retention rates of men and women faculty. The median time to departure for men is 7.33 years, and for women it is 4.45 years. No other discipline shows gender effects at the 95% confidence level. Annual surveys of the discipline by the American Mathematical Society (23) track the recruitment of new doctoral recipients into academic mathematics but have not examined retention. Our data suggest that there are significant retention issues in the discipline deserving of further scrutiny.

References and Notes

1. Y. J. Xu, *Res. Higher Educ.* **49**, 607 (2008).
2. University of Colorado at Boulder, "Faculty recruitment and retention task force report" (2001), www.colorado.edu/AcademicAffairs/fac_recruit/fac_recruit.doc.
3. National Academy of Sciences, National Academy of Engineering, and Institute of Medicine, *Beyond Bias and Barriers: Fulfilling the Potential of Women in Science and*

Engineering (National Academies Press, Washington, DC, 2007).
4. R. R. Callister, *J. Technol. Transf.* **31**, 367 (2006).
5. R. Ehrenberg, H. Kasper, D. Rees, *Econ. Educ. Rev.* **10**, 99 (1991).
6. M. Nagowski, *Am. Econ.* **50**, 69 (2006).
7. V. Valian, *Why So Slow? The Advancement of Women* (MIT Press, Cambridge, MA, 1998).
8. D. Nelson, D. Rogers, "A national analysis of diversity in science and engineering faculties at research universities" (University of Oklahoma, Department of Chemistry, 2006), http://faculty-staff.ou.edu/N/Donna.J.Nelson-1/diversity/briefings/Diversity%20Report%20Final.pdf.
9. T. J. Ley, B. H. Hamilton, *Science* **322**, 1472 (2008).
10. W. W. Ding, F. Murray, T. E. Stuart, *Science* **313**, 665 (2006).
11. National Research Council Committee on Gender Differences in the Careers of Science, Engineering, and Mathematics Faculty; Committee on Women in Science, Engineering, and Medicine; and Committee on National Statistics; *Gender Differences at Critical Transitions in the Careers of Science, Engineering, and Mathematics Faculty* (National Academies Press, Washington, DC, 2010).
12. Y. J. Xu, *Res. Higher Educ.* **49**, 40 (2008).
13. Y. Zhou, J. F. Volkwein, *Res. Higher Educ.* **45**, 139 (2004).
14. A. E. Preston, *Leaving Science: Occupational Exit from Scientific Careers* (Russell Sage Foundation, New York, 2004).
15. S. Gardner, *J. Professoriate*; available online at http://umaine.academia.edu/SusanGardner/Papers/464281/Cumulative_negativity_Reasons_for_women_faculty_departure_from_one_research_institution.
16. D. K. Rausch, B. P. Ortiz, R. A. Douthitt, L. L. Reed, *CUPA J.* **40**, 1 (1989).
17. Methods are available as supporting material on *Science* Online.
18. Faculty in the most recent two cohorts have not been in position long enough to provide useful data for most of our research questions.
19. V. J. Rosser, *Res. Higher Educ.* **45**, 285 (2004).
20. D. W. Hosmer, S. Lemeshow, S. May, *Applied Survival Analysis* (Wiley, Hoboken, NJ, 2008).
21. C. Geisler, D. Kaminski, R. A. Berkley, *NWSA J.* **19**, 145 (2007).
22. R. Marschke, S. Laursen, J. M. Nielsen, P. Dunn-Rankin, *J. Higher Educ.* **78**, 1 (2007).
23. R. Cleary, J. W. Maxwell, C. A. Rose, *Not. Am. Math. Soc.* **57**, 1306 (2010).

110