



## Brain, Neurosciences, & Education SIG Newsletter

American Educational Research Association

San Francisco, CA

Spring 2006

### Special Presidential Session

#### ***Education and Neuroscience: Will Collaborations Enhance the Public Good?***

**Time: Sat, Apr 8 - 4:05pm - 6:05pm**

**Place: Moscone Center South, Esplanade Ballroom, Section 301**

Virginia Berninger, University of Washington

Brian Butterworth, University College London

Carol Dweck, Columbia University

John Geake, Oxford Brookes University

Jennifer Mangels, Columbia University

Roy Pea, Stanford University, Discussant

### SIG Sessions

#### Invited Paper Sessions

#### ***Developmental Neuroscience: Are there Implications for Educational Neuroscience?***

**Time: Fri, Apr 7 - 4:05pm - 6:05pm**

**Place: Moscone Center North, Exhibit Level, Rm 110**

Michael Atherton, University of Minnesota, Chair

*The Development and Neural Bases of Cognitive Flexibility and Executive Function*

Adele Diamond, University of British Columbia

*The Neural Bases of Quantitative Reasoning: Insights from Typical and Atypical Development*

Susan Rivera, UC Davis

*Developing Memory: Relations Between Brain and Behavior in Infancy and Early Childhood*

Patricia Bauer, Duke University

John Geake, Oxford Brookes University, Discussant

#### ***The Neuroscience of Reading: What Brain Processes are Involved in Reading?***

**Time: Sun, Apr 9 - 10:35am - 12:05pm**

**Place: Moscone Center West, 2nd Floor, Rm 2002**

Read Dickett, William Carey College, Chair

*The Development of Phonological Awareness: Evidence from fMRI*

Russell Poldrack, UCLA

*Brain Activation during Sentence Comprehension among Good and Poor Readers: Evidence of Developmental Trends*

Ann Meyler, Carnegie Mellon University

*Brain Mechanisms of Reading Development*

Bruce McCandliss, Sackler Institute/Cornell University

## ***The Neuroscience of Reason and Emotion***

**Time: Sat, Apr 8 - 8:15am - 10:15am**

**Place: Moscone Center North, Exhibit Level, Rm 110**

Carol Fry Bohlin, California State University – Fresno, Chair

*Mixed Signals: How the Same Face Means Different Things Across Development*

Nim Tottenham, Sackler Institute for Developmental Psychobiology

*The Teen Species: Learning to Integrate Cognition and Emotion*

Abigail Baird, Dartmouth College

*Research Findings in the Neuroscience of Decision Making*

Stephanie Preston, University of Michigan

*Neural Basis of Executive Control in Childhood ADHD*

Chandan Vaidya, Georgetown University

## Submitted Paper Session

## ***Educational Neuroscience: Research, Ethics, Teaching, and Application***

**Time: Sat, Apr 8 - 10:35am - 12:05pm**

**Place: Moscone Center West, 2nd Floor, Rm 2001**

David Wodrich, Arizona State University, Chair

*Center of Excellence for Learning in Education, Science, and Technology (CELEST)*

Daniel Franklin, Boston University; Stephen Grossberg, Boston University; Paul Trunfio,

*Neuroscience and Education: Towards Integrated Investigations*

Paul Howard-Jones, Graduate School of Education

*On the Convergence of Neuroethics, Imaging and Education*

Judy Illes, Stanford University; Katie Alton, Stanford University; Thomas Raffin, Stanford University

*Launching a Graduate Education Course in Educational Neuroscience*

Stephen Campbell, Simon Fraser University

## Roundtables

## ***Educational Neuroscience: Papers on ADHD & PTSD and Behavioral Genetics***

**Time: Mon, Apr 10 - 4:05pm - 4:45pm**

**Place: Moscone Center West, 3rd Floor, Rm 3005**

*MRI Meta Analysis: Compare/Contrast ADHD & PTSD*

Miranda Palmer, University of Phoenix; Dawn Strongin, California State University, Stanislaus

*The Behavioral Genetics of Reinforcement: A Pilot Study*

Jeremy Genovese, Cleveland State University

## ***Educational Neuroscience: Topics in Brain Research and Teaching***

**Time: Mon, Apr 10 - 12:25pm - 1:05pm**

**Place: Moscone Center West, 3rd Floor, Rm 3005**

*A Brain Research Course for Teachers*

Colleen Willard-Holt, Pennsylvania State University - Harrisburg

*Functional Neuroimaging Evidence for the Involvement of the Frontal Cortex in Attention Deficit Hyperactivity Disorder*

Daniel Davies, University of California - Berkeley

## SIG Business Session

## ***Brain, Neurosciences, and Education SIG Business Meeting***

**Time: Fri, Apr 7 - 6:15pm - 8:15pm**

**Place: Moscone Center North, Exhibit Level**

## SIG Update

This is an exciting year for our SIG. We have the honor of co-listing a symposium on neuroscience and the public good with AERA and also have three invited sessions this year. The number of paper submissions has also increased, allowing us to select a diverse and interesting set of papers for our sessions and roundtables. There are now two hundred SIG members many of whom have joined from outside of the United States. Our increase in membership has also helped stabilize our financial situation, which may help us attract speakers for 2007 or allow us to organize a reception for prospective members at next year's meeting.

In the last year it appears that interest in building in the connections between the Neurosciences and Education. I represented the SIG as a participant in a symposium, "Educational Research and the Neurosciences: Questions, Directions, Collaborations, and Funding" at the Society for Neuroscience meeting in Washington, D.C. We have also added a suggested reading list of papers related to Educational Neuroscience on our SIG webpage. Last year our first annual SIG dinner was a great success

Looking to the future, we have elected a new SIG secretary, Dr Jeffrey Gilger. Jeff is the Associate Dean for Discovery and Faculty Development at Purdue University. He has earned an MA and Ph.D. in Developmental Psychology, with specialized training in Human Behavioral and Psychiatric Genetics. His primary areas of teaching and research are normal and abnormal neuropsychological development and human behavioral genetics, with particular emphasis on the etiology of learning-language disabilities (LD). Jeff currently serves on the International Dyslexia Association (IDA) Board of Directors as Vice President as well as the IDA Research

Subcommittee Chair. He is presently working on a study of the genetic and neurological basis of superior nonverbal abilities in LD children and a large scale national project reviewing the efficacy of the LD treatment programs utilized by the Scottish Rite Masons at their Learning Centers for children. In other election news I have been approved to serve an additional year as president to allow our current program chair, David Wodrich, to serve two full years as program chair.

Michael Atherton, SIG President

## News

- The newly formed International Mind, Brain, and Education Society (IMBES) will be announcing the creation of a new journal in Educational Neuroscience. Anyone who is interested in joining their organization can download a membership form from their website: [www.imbes.org](http://www.imbes.org).
- The University of British Columbia will be hosting a conference, "Brain Development & Learning: Making Sense of the Science" in August. For additional information visit their website: [http://www.interprofessional.ubc.ca/brain\\_dev\\_and\\_learning.html](http://www.interprofessional.ubc.ca/brain_dev_and_learning.html).

## SIG Membership

For information about how to join the Brain, Neurosciences, and Education SIG visit our website at [www.umn.edu/~athe0007/BNEsig](http://www.umn.edu/~athe0007/BNEsig) or send email to [athe0007@mn.rr.com](mailto:athe0007@mn.rr.com).