

General Chair

Natasa Miskov-Zivanov, University of Pittsburgh

General Secretary

Laura Adam, Virginia Tech

Program Committee Chairs

Xiling Shen, *Cornell*Deepak Chandran, *University of Washington*Leonidas Bleris, *University of Texas at Dallas*

DAC Liaison

Smita Krishnaswamy, Columbia

Publication Chair

Chris Myers, University of Utah

Industry/Government Funding Chair

Jonathan Babb, MIT

Finance Chairs

Aaron Adler, *BBN Technologies* Fusun Yaman, *BBN Technologies* The International Workshop on Bio-Design Automation (IWBDA) brings together researchers from the synthetic biology, systems biology, and design automation communities. The focus is on concepts, methodologies, and software tools to enable the computational analysis of biological systems and the synthesis of novel biological functions.

Still in its early stages, the field of synthetic biology has been driven by experimental expertise; much of its success has been attributable to the skill of the researchers in specific domains of biology. There has been a concerted effort to assemble repositories of standardized components. However, creating and integrating synthetic components remains an *ad hoc* process. The field has now reached a stage where it calls for computer-aided design tools. The electronic design automation (EDA) community has unique expertise to contribute to this endeavor. This workshop offers a forum for cross-disciplinary discussion, with the aim of seeding collaboration between the research communities.

Tracks of interest include:

- Design methodologies for synthetic biology.
- Standardization of biological components.
- Automated assembly techniques.
- Computer-aided modeling and abstraction techniques.
- Engineering methods inspired by biology.
- Domain specific languages for synthetic biology.
- Data exchange standards and models for synthetic biology.

Invited Speakers

Jeff Hasty, *UC San Diego* Jasmin Fisher, *Microsoft, UK* William Shih, *Harvard* Milan Stojanovic, *Columbia*

Program Committee

J. Christopher Anderson, UC Berkeley Adam Arkin, UC Berkeley Jonathan Babb, MIT Jacob Beal, BBN Technologies Leonidas Bleris, UT Dallas Kevin Clancy, Invitrogen Douglas Densmore, Boston University Drew Endy, Stanford Abhishek Garg, Harvard University Soha Hassoun Tufts Mark Horowitz Stanford Alfonso Jaramillo, Ecole Polytechnique Yannis Kaznessis, University of Minnesota Eric Klavins, University of Washington Tanja Kortemme, UCSF Smita Krishnaswamy, Columbia Natasa Miskov-Zivanov, University of Pittsburgh Kartik Mohanram, Rice Chris Myers, University of Utah Andrew Phillips, Microsoft Research Mark Riedel, University of Minnesota Herbert Sauro University of Washington Xiling Shen, Cornell David Thorsley, University of Washington Christopher Voigt, UCSF Ron Weiss, MIT Erik Winfree, Caltech Chris Winstead, Utah State University

The workshop will be held at the Moscone Center in San Francisco on **June 3rd - 4th, 2012**, co-located with the Design Automation Conference, the premier conference in the field of electronic design automation with over 10,000 attendees. Registration information will be posted on the workshop webpage: http://www.biodesignautomation.org

For questions, please email info@biodesignautomation.org

Abstract Submission:

Abstracts should be two pages long, following the ACM SIG Proceedings templates at http://www.acm.org/sigs/publications/proceedings-templates. Indicate whether you would like your abstract considered for a poster presentation, an oral presentation, or both. Include the full names, affiliations and contact information of all authors.

Abstracts will be reviewed by the Program Committee. Those that are selected for oral and poster presentations will distributed to workshop participants and posted on the workshop website.

Abstracts should be submitted by **April 2nd** at: http://www.easychair.org/conferences/?conf=iwbda2012

Journal Special Issue

As in years past, we plan to have a special issue of a journal associated with IWBDA. Details will be posted on the workshop website when they become available.

Key Dates

Call for abstracts published: **February 3rd, 2012** Abstract submission deadline: **April 2nd, 2012** Abstract acceptance notification: **May 7th, 2012**

Workshop: June 3rd & 4th, 2012