



May 2007

Biotech News

- Researchers identify new variants of the gene for Fibroblast Growth Factor Receptor 2, that increase breast cancer risk for women of European ancestry by about 20% if they carry one copy, and 60% if they carry two.
<http://www.hsph.harvard.edu/news/press-releases/2007-releases/press05272007.html>
- Scientists at Geron Co. and the U. of Alberta have differentiated human embryonic stem cells into cell clusters similar in composition to the islets of Langerhans. These clusters secrete insulin in response to elevated glucose levels, showing a possibility of producing therapeutic cell types for treating Type I diabetes.
<http://www.geron.com/pressview.asp?id=802>
- International research team show that red-blood cells lose their ability to squeeze through capillaries in malaria, due to the transfer of a protein from *P. falciparum* significantly reducing their deformability
<http://web.mit.edu/newsoffice/2007/malaria-0521.html>
- A research team develops a new protein to treat exposure to *Staphylococcus aureus* enterotoxin B (SEB) – a common cause of food poisoning, and a possible bio-terrorism agent. <http://www.news.uiuc.edu/news/07/0521kranz.html>
- Researchers develop mixture of 13 novel enzymes to convert biomass to hydrogen.
<http://www.vtnews.vt.edu/story.php?relyear=2007&itemno=300>

James Bailey Award Nominations

In memory of Professor Jay Bailey for his many pioneering contributions to biotechnology, SBE's James Bailey award (endowed by Cytos Biotechnology) is presented to an individual who has had an important impact on bioengineering and whose achievements, either specific or general, have advanced this profession in any of its aspects. Award winners include Michael Shuler of Cornell University, Robert Langer of MIT, Edwin Lightfoot of the University of Wisconsin, and Nicholas Peppas of the University of Texas at Austin. Nominate a colleague by following the instructions at <http://www.aiche.org/SBE/About/Awards.aspx>. The deadline for accepting nominations is June 30th.

SBE Conferences

Registration is now open to attend **SBE's 3rd International Conference on Bioengineering and Nanotechnology (ICBN 2007)** on August 13-15, 2007 in Biopolis, Singapore. Professor Jackie Ying, head of Singapore's Institute for BioNanotechnology, is chairing the event. Register [here](#).

The Call for Papers is open for **SBE's 1st International Conference on Stem Cell Engineering** on January 20-23, 2008 in Coronado, CA. Topics include:

- Biomaterials for stem cell growth and differentiation
- Biomaterial scaffolds for stem cell therapeutic applications

- Bioreactors and bioprocesses for cell expansion and differentiation
- High throughput and microfluidic screening platforms
- Intercellular signaling and the engineered niche
- Systems based approaches to understanding fate decisions
- Novel approaches for embryonic stem cell growth and differentiation
- Novel approaches for adult stem cell growth and differentiation
- Stem cells and drug discovery: pharmacology and toxicology screening platforms.

Find out more about this exciting new conference at <http://www.aiche.org/StemCellEng>.

Register now to attend a new conference on bio-economics on September 25, 2007 in Gaithersburg, MD. SBE as a member of the Biotech Council is cosponsoring a conference, on "**Bioeconomics: Developing an Economic Strategy for Healthcare Bio and Information Technologies,**" together with the Department of Commerce's National Institute of Standards and Technology. Jerome Grossman, Senior Fellow and Director of the Harvard/Kennedy School Health Care Delivery Policy Program is chairing the event. More information is available at <http://www.itl.nist.gov/Healthcare/conf/index.htm>.

The preliminary program for **AICHe's Annual Meeting** on November 4-9, 2007, in Salt Lake City, Utah is available. View the many sessions focusing on biotechnology [here](#).

A complete bio-event calendar can be found at <http://www.aiche.org/SBE/Events/index.aspx>

Join SBE

Not a current SBE member? It's never too late to join or renew. Costs are \$75 for regular members, \$25 for graduate students, \$10 for AICHe, ACS and IBE members, or \$5 for undergraduates. Join now at <https://www.aiche.org/apps/ecommerce/bio/index.asp>.

Member benefits include:

- Subscription to SBE's semi-annual BioSupplement to Chemical Engineering Progress.
- Discounts on leading biological engineering conferences including SBE and SBE cosponsored meetings and courses.
- Access to online membership directory.
- A voice in education, employment and technology advancement topics.

Comments?

SBE's e-Connections is edited by Adrian Andrew Fay, Web Science Editor, with input from various SBE staff. Contact us at bio@aiiche.org

*The Society for Biological Engineering (SBE) is a new technological community of AICHe
Its mission is to promote the integration of biology with engineering and realize its benefits
through bioprocessing, biomedical, and biomolecular applications.
For comments and contributions to SBE Connections, email <mailto:bio@aiiche.org>*

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