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TERMIS Administrator

### [Letter from the President, Jöns Hilborn](#)

Dear Friends and Colleagues,

Welcome to the first issue of the TERMIS newsletter for 2008! As my term as President begins, I would like to take a moment to thank Alan Russell for his dedication, support and all the time and energy that he has provided to TERMIS as President over the past two years.

The initial groundwork for the creation of TERMIS started in 2004 and by October 2005 the European Tissue Engineering Society, the Tissue Engineering Society and several Asian Societies merged with the main purpose of creating one truly international organization with three regional Chapters – Asia-Pacific, Europe and North America. The Governing Board is pleased by the increasing number of members from the Emerging Countries. We encourage you to become involved and communicate with Mona Marei, the Emerging Countries representative, to spearhead the interaction of researchers within your areas.

Over the past two years, TERMIS has been focusing on establishing and approving its by-laws, conducting its first and second elections, launching the website, hosting its first World Congress and several Chapter meetings, forming the Student and Young Investigator Section (SYIS), compiling the newsletter, and building a relationship with the publishers of the journal, *Tissue Engineering*, which offers free online access to the journal, as well as, significantly reduced subscription rates on the print version of the journal to our members.

Our continued objective is to coordinate outstanding annual Chapter meetings to continue the communication and interaction amongst the researchers and students within the region. The Chapter meetings are a way for the Society's members to come together and discuss the latest

research, establish new ideas and interact with other researchers within the field. Membership to TERMIS is included in the registration fee making it easy to continue your membership within the Society.

I encourage you to attend one, two or all three of the annual Chapter meetings this year. The European meeting will be held in June 22-26 in Porto, Portugal; the Asian-Pacific meeting will be held in November 7-8 in Chinese Taipei; and the North American meeting will take place in San Diego from December 6-10. Every three years, TERMIS hosts a World Congress that will bring together everyone from around the world with the next one planned from August 31-September 3, 2009 in Daejeon, South Korea. More details on registrations, abstract submissions and hotel reservations for all TERMIS meetings can be found at [www.termis.org](http://www.termis.org).

We need to continue to focus on our young researchers as they are the future of the field. The three regional Chapters of SYIS have been very interactive in coordinating student events during the annual meetings, such as, the student-meet-mentor sessions, student co-chairs, a career center, a project proposal competition, lab and poster tours, and various social activities. If you are a student member of TERMIS, we encourage you to contact your SYIS Chapter representative to become more actively involved.

TERMIS was formed to integrate the world of tissue engineering and regenerative medicine research on a global scale. We are on our way to accomplishing this mission, but need to continue working together as a whole to encourage interaction amongst researchers in the field. We are in a field that is continuously evolving with new challenges, but with one ultimate goal: to find cures and new technologies that will ultimately affect human beings around the world.

I encourage anyone to contact me at anytime with your suggestions and ideas for the Society. I look forward to working with the TERMIS Governing Board and the Chapter Councils over the next two years!

Sincerely,



Jöns Hilborn, PhD  
TERMIS President



## Upcoming 2008 TERMIS Chapter Meetings!

Register NOW for the 2008 TERMIS-EU Porto Meeting!

**Abstracts being ACCEPTED! Submit your abstract to the 2008 TERMIS-NA San Diego Meeting TODAY!**

### June 2008

TERMIS-Europe: Porto, Portugal  
Porto Congress Center – Alfândega  
Meeting Chair: Rui Reis  
23-26 June 2008  
[www.termis.org/eu2008](http://www.termis.org/eu2008)

Register and Book Your Hotel Room Today!

To learn more about SYIS-EU Activities, visit  
<http://www.termis.org/eu2008/students.php>

### November 2008

TERMIS-Asia-Pacific: Chinese, Taipei  
Taipei International Convention Center  
Meeting Chair: Prof. Ging-Ho Hsieh  
November 7-8, 2008  
[www.termis.org/ap2008](http://www.termis.org/ap2008)

### December 2008

TERMIS-North America: San Diego, California  
In Conjunction with CTEM

Hyatt Regency La Jolla  
Meeting Chairs:  
Bill Tawil, Bob Sah and Anthony Ratcliffe  
December 7-10, 2008  
[www.termis.org/na2008](http://www.termis.org/na2008)

**Abstracts invited!**

**The abstract system is now OPEN!**

**The abstract submission deadline is**

**June 30, 2008.**

## Student and Young Investigator Section - SYIS

### Events Organized by TERMIS-EU SYIS at Porto Meeting

The Student and Young Researchers Section (SYIS) of TERMIS-EU is pleased to organize several events at the forthcoming meeting in Porto. The role of SYIS is to help and encourage young researchers to network and interact with experts in the field and to foster personal professional development.

#### WE LOOK FORWARD FOR YOUR PARTICIPATION!

#### INTERNATIONAL PROJECT PROPOSALS FOR STUDENTS AND YOUNG INVESTIGATORS

*Open for all SYIS members*

Following the success of the previous SYIS Project Competition (London Meeting 2007), TERMIS-SYIS will hold an "International Project Proposal Competition" in the Porto Meeting.

This proposal calls for several researchers to collaborate and put together a research proposal focusing on the scientific excellence, impact to TERM field and also on the consortium.

**Deadline: Friday, April 11, 2008.**

#### Criteria:

The project to be proposed may be launched on any branch of the Tissue Engineering and Regenerative Medicine field (click here for details and eligibility criteria

[http://www.termis.org/eu2008/docs/termisEU2008\\_SYIS\\_CallForInternationalProjectsCompetition.doc](http://www.termis.org/eu2008/docs/termisEU2008_SYIS_CallForInternationalProjectsCompetition.doc)

All participants/partners should be eligible members of TERMIS-SYIS;

It should be restricted to a maximum number of 3 participants/partners, including the coordinator;

It must involve international collaborations;

The project should be designed considering the time window of 2 years;

The project proposals should not exceed a maximum of 3 pages (use the **Template**

[http://www.termis.org/eu2008/docs/termisEU2008\\_SYIS\\_InternationalProjectsTemplate.doc](http://www.termis.org/eu2008/docs/termisEU2008_SYIS_InternationalProjectsTemplate.doc)

CVs (max. 1 page) are required for all participants/partners;

Projects will be evaluated considering: scientific excellence, impact to TERM field and quality of the consortium.

#### Applications must include:

The project proposals (max. 3 pages – use template provided);

CVs of all participants of the consortium (max. 1 page).

Successful applicants will present their idea to an audience and a panel of judges during the TERMIS-EU 2008 Annual Meeting with the **winners receiving a prize of 1,500 Euros.**

Further information on the call and template for project submission can be obtained contacting Catarina Alves at [cmalves@dep.uminho.pt](mailto:cmalves@dep.uminho.pt) or Miguel Oliveira at [miguel.oliveira@dep.uminho.pt](mailto:miguel.oliveira@dep.uminho.pt).

**STUDENT MENTOR HAPPY HOUR***Open for all SYIS members**Place and Date: To Be Confirmed*

As previously, TERMIS-SYIS will be hosting the student-mentor happy hour. **This event will allow students and young investigators to network with world-renowned academic and industrial researchers.** Students and young investigators will be assigned to tables based on their mentor preferences. Selections will be made on a first come first serve basis to the first 100 students and young investigators.

Complimentary beverages will be served.

Please check this page for future updates. For more information please contact Yvonne Bastiaansen at

[y.bastiaansen@erasmusmc.nl](mailto:y.bastiaansen@erasmusmc.nl) or Eric Farrell at [e.farrel@erasmusmc.nl](mailto:e.farrel@erasmusmc.nl)

**SCIENTIFIC SESSION CO-CHAIRS***Open for all SYIS members*

TERMIS-EU SYIS is pleased to announce the opportunity for students and young investigators to serve as co-chairs for the scientific sessions at the TERMIS-EU Porto Meeting in June.

All applicants for these positions must meet the criteria below:

**Criteria:**

Must be a TERMIS-SYIS member

Must have submitted an abstract and have it accepted for either an oral or poster presentation

Must be proficient in English

**Applications must include:**

Short Bibliographic Sketch (one page)

Your research details: institution, advisor, and research topic

A 250 words essay on why you would like to serve as a session co-chair

A list of the 3 top sessions for which you would like to be co-chair (in order of preference)

Complete applications must be emailed to João Oliveira at [joao.oliveira@dep.uminho.pt](mailto:joao.oliveira@dep.uminho.pt) or to Catarina Alves at [cmalves@dep.uminho.pt](mailto:cmalves@dep.uminho.pt) no later than **Friday, May 02, 2008**.

**GUIDED POSTER TOUR***Open for all SYIS members**Place and Date: To Be Confirmed*

TERMIS-EU SYIS will be hosting a **Guided Poster Tour**. The aim of this activity is to help students to critically assess posters on display in an informal group setting. Students will be led to several posters with the senior guides who will direct the discussion about the merits and disadvantages of poster layouts, research approaches and presentation.

Please check this page in the future updates. For more information please contact Yvonne Bastiaansen at

[y.bastiaansen@erasmusmc.nl](mailto:y.bastiaansen@erasmusmc.nl).

**TERMIS EU MEETING CAREER CENTER**

The Meeting Career Center aims at enhancing professional opportunities for the attendees of the upcoming TERMIS-EU Porto Meeting.

The career center will be available for academic laboratories or industry representatives who are interested in a global resource for potential applicants. If you would like to post current job openings within your organization, please send information pertaining to the job opening to Catarina Alves at [cmalves@dep.uminho.pt](mailto:cmalves@dep.uminho.pt). A posting will be created at the TERMIS-EU Meeting and at the SYIS Forum.

**TERMIS-SYIS GENERAL ASSEMBLY**

*Open for all SYIS members*

*Place and Date: To be confirmed*

**Join us for the open members meeting to discuss current topics affecting TERMIS-EU SYIS.** It will be an opportunity for you to take part in present and future actions of TERMIS-EU SYI Section.

**SYIS SOCIAL NIGHT**

*Open for all SYIS and TERMIS members*

*Place and Date: 22<sup>nd</sup> June 2008; Bazaar, Porto*

Enjoy this opportunity to meet and **network with students and young investigators from around the world who are attending the TERMIS-EU Meeting.**

The SYIS Social Night will take place in a bar close to the TERMIS-EU 2008 venue centre. Its lounge style atmosphere is the perfect environment to get to know your peers. It has both open and closed spaces being considered a reference in the night tour of Porto.

Drinks will be available to every participant and more senior TERMIS members interested in contacting with the future pioneers in the field of TERM are also most welcome to join.

Please confirm your presence by email to João Oliveira ([joao.oliveira@dep.uminho.pt](mailto:joao.oliveira@dep.uminho.pt)) until **Monday, May 30, 2008**.

## North American Students and Young Investigator Section (SYIS-NA)

### Welcomes New Meeting and Fundraising Committee Chairs

NA-SYIS would like to extend a special thank you to Doug Baumann and his team for the hard work they put in to planning the student activities for the 2007 TERMIS meeting. As we say goodbye to Doug, we would like to welcome Jennifer Hwang and Allison Finger as the new co-chairs of the fundraising committee. Jen is a Ph.D. candidate at the University of California, San Diego in the laboratory of Dr. Robert L. Sah. Allison is a Ph.D. candidate at the University of California, San Diego in the laboratory of Dr. Shyni Varghese. Jen and Allison are already hard at work planning the student activities for the 2008 TERMIS meeting.

### 2008 TERMIS Student Activities Are Gearing Up

The new meeting and fundraising committee chairs, Jen and Allison, have been hard at work planning the student activities for the 2008 TERMIS meeting in San Diego. Many of your favorite events from last year will be included as well as a couple of new events. Tentatively scheduled events include a welcome reception, resume workshop, poster competition, career fair, fun run 5K, student mentor lunch, and a panel discussion. Stay tuned for more details about these events as the meeting approaches. If you are interested in helping with the student activities at the 2008 TERMIS meeting, please contact Julie Steen at [justeen@wfubmc.edu](mailto:justeen@wfubmc.edu).

### 2008 Tentative Schedule for SYIS-NA Activities in San Diego

Visit the TERMIS-NA 2008 San Diego conference website, [www.termis.org/na2008](http://www.termis.org/na2008), for the latest information on the SYIS-NA activities.

#### Saturday December 6

7:00-9:00 p.m.: Welcome Reception

#### Sunday December 7

12:45-1:45 p.m.: Resume Workshop

6:00-8:00 p.m.: Poster Competition

6:00-8:00 p.m.: Career Fair

#### Monday December 8

7:00-7:45 a.m.: Fun Run

12:30-1:30 p.m.: Student Mentor Lunch

#### Tuesday December 9

12:30-1:30 p.m.: SYIS Annual Business Meeting

5:00-11:00 p.m.: Social Event

#### Wednesday December 10

8:30-9:30 a.m.: Panel Discussion

**\*\*Schedule is subject to change.**

**TERMIS-EU Summer School***Blood Transfusion Centre of Slovenia**Faculty of Technology and Metallurgy, University of Belgrade, Serbia**National Institute of Biology, Slovenia**Tissue Engineering and Regenerative Medicine International Society-Europe*

Organizes the

**International Summer School***On***Advanced Biomedical Technologies for Treatment of Osteochondral Defects***Piran, Slovenia, September 14- 21, 2008*

The Summer School is organized as a PhD level course intended for graduate students in engineering and life sciences, with the focus on advanced approaches to the treatment of osteochondral defects. The aim is to introduce the students to different aspects of developing new strategies for clinical applications, starting with the clinical problem and laboratory scale systems, and ending with engineering, ethical and legislative issues in translation to clinics. The course will begin with the physiology of cartilage and bone, and the clinical problem of injury of these tissues. Next, the tissue engineering approaches to regeneration of injured tissues will be presented, with focus on the design and selection of appropriate biomaterials, and the design and operation of bioreactor systems. Finally, the methods for evaluation of engineered tissues will be reviewed followed by ethical issues and legislation in clinical applications. The course will include lectures and laboratory demonstrations of synthesis and production of various biomaterials as well as set up and operation of several tissue engineering bioreactors.

**Program:**

Clinical problem of cartilage and bone tissue injury

Autologous cell therapies for cartilage and bone tissue regeneration

Tissue engineering approaches to treat osteochondral defects

Biomaterials for cell support for cartilage and bone regeneration:

- Hydrogels (applications in cartilage tissue regeneration)
- Hydroxyapatites and composite biomaterials for bone tissue regeneration

Smart biomaterials in regeneration of cartilage and bone (functionalized biomaterials, biomaterials with controlled delivery of regulatory molecules, composite biomaterials)

Bioreactor systems for cartilage and bone tissue engineering

Characterization of engineered tissues

Ethical issues and legislation

Lecturers:

Andrea Barbero, Research Associate, University Hospital Basel

Bianca Baroli, Assistant Professor, University of Cagliari

Branko Bugarski, Professor, University of Belgrade

Smadar Cohen, Professor, Ben-Gurion University of the Negev

Matej Drobnič, Orthopaedic Surgery Consultant, University Medical Centre, Ljubljana

Djordje Janackovic, Associate Professor, University of Belgrade

Charles Kessler, Principal Scientific Officer, European Commission, Directorate-General for Research

Hana Krecic-Stres, Project Manager, Educell d.o.o.

Nevenka Kregar Velikonja, Managing Director, Educell d.o.o.

Darja Marolt, Postdoctoral Scholar, Columbia University

Lorenz Meinel, Senior Scientist, ETH Zurich

Ulrich Noth, Head of the Division of Tissue Engineering, University of Wurzburg

Bojana Obradovic, Associate Professor, University of Belgrade

Michael Sittinger, Head of the Laboratory for Tissue Engineering, Charite University Medicine

Ralf Toenjes, Professor, Paul Erlich Institute, Langen

Gordana Vunjak-Novakovic, Professor, Columbia University

Dieter Wirz, Senior Scientist, University-Hospital Basel

Literature: Course notes available on July 15, 2008

Exam: 2 hour written exam after the completion of the course

Total: 35 hours, 4 ECTS credits

Certificate: The students who have completed the course and passed the exam will obtain a certificate for the PhD level course "Advanced Biomedical Technologies for Treatment of Osteochondral Defects" (4 credits) from the Faculty of Technology and Metallurgy, University of Belgrade, Serbia.

Fees: The School fee is 300 Eur, which will include attendance to the school lectures, exam, course notes, the book of abstracts as well as welcome cocktail and the farewell dinner.

All students from Slovenia and Serbia are granted with the 60 % of the School fee by the Blood Transfusion Centre of Slovenia and the Faculty of Technology and Metallurgy, University of Belgrade so that the school fee for them is 120 Eur.

All members of the Tissue Engineering and Regenerative Medicine International Society (TERMIS) are granted with 60 % of the School fee.

Students of the Faculty of Technology and Metallurgy, University of Belgrade are exempt of paying the School fee and will receive the book of abstracts and course material for free.

For a limited number of the best graduate students who are granted stipends from the Ministry of Science, Republic of Serbia during the year 2008, free travel to Piran, accommodation and attendance to the School will be arranged.

Contact persons:

Miomir Knezevic ([miomir.knezevic@ztm.si](mailto:miomir.knezevic@ztm.si); [miomir.knezevic@nib.si](mailto:miomir.knezevic@nib.si))

Chair of the Organizing Committee

Assist. Prof.

Head Unit for the Collection and Processing of Haematopoietic Stem Cells, Blood Transfusion Centre of Slovenia

Assistant Director of Technology Transfer, National Institute of Biology, Slovenia

Bojana Obradovic ([bojana@tmf.bg.ac.yu](mailto:bojana@tmf.bg.ac.yu))

Co-chair of the Organizing Committee

Assoc. Prof. & Vice-Dean

Faculty of Technology and Metallurgy, University of Belgrade

Program Committee:

Bojana Obradovic (University of Belgrade)

Gordana Vunjak-Novakovic (Columbia University)

Miomir Knezevic (Blood Transfusion Centre of Slovenia)

Organizing Committee:

Miomir Knezevic (Chair, Blood Transfusion Centre of Slovenia)

Bojana Obradovic (Co-Chair, University of Belgrade)

Ivan Martin (University Hospital Basel, Switzerland)

Nevenka Kregar (Educell, d.o.o., Slovenia)

Branko Bugarski (University of Belgrade)

Gaspar Polajnar (National Institute of Biology, Slovenia)

Jure Sah (Blood Transfusion Centre of Slovenia)

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## Newly Elected TERMIS Officer and Council Members

**President-Elect:** Stephen Francis Badylak, D.V.M., M.D., Ph.D.



Dr. Stephen Badylak is a Professor in the Department of Surgery and deputy director of the McGowan Institute for Regenerative Medicine at the University of Pittsburgh. In 1976, he received his D.V.M. from Purdue University and he completed his M.S. in Clinical Pathology from Purdue University in 1978. Dr. Badylak also holds a Ph.D. in Anatomic Pathology from Purdue University (1981) and graduated with a M.D. from Indiana University Medical School in 1985.

Dr. Badylak holds over 40 US patents and 200 patents worldwide and has authored more than 180 scientific publications and 12 book chapters. He has served as the Chair of the Purdue University Tissue Engineering Advisory Board and as chair of several Study Sections for the National Institutes of Health (NIH), including the Biotechnology, Technology, and Surgical Sciences Study Section. Dr. Badylak has either chaired or been a member of the Scientific Advisory Board to several major medical device companies.

Dr. Badylak is a Fellow of the American Institute for Medical and Biological Engineering. He is a charter member of the Tissue Engineering Regenerative Medicine International Society (TERMIS). Dr. Badylak is a member of the Society for Biomaterials and the International Society for Applied Cardiovascular Biology (ISACB).

Dr. Badylak has received numerous awards for excellence in research and has emphasized the clinical translation of his work. More than 1 million patients have been treated with one or more forms of biologic scaffold materials that have been discovered in his laboratory.

**Member-At-Large, Asia-Pacific:** Tatsuya Shimizu, M.D., Ph.D.



Dr. Shimizu is an associate professor of Department of Tissue Regeneration, Institute of Advanced Biomedical Engineering and Science, Tokyo Women's Medical University. He graduated from Faculty of Medicine, the University of Tokyo and got medical doctor (M.D.) in 1992. After two-years of clinical training, Dr. Shimizu made a specialty of cardiovascular medicine including catheterization. In 1995, he started to research signal transduction of growth factors in cardiomyocytes at Graduate School of Medicine, the University of Tokyo. He received his doctoral Degree (Ph.D.) in 1999. After that, Dr. Shimizu moved to ABMES of TWMU as a research assistant professor and began myocardial tissue engineering research. He has already fabricated pulsatile myocardial tissues by novel technology "Cell Sheet Engineering" which is proposed by Prof. Okano, Director of ABMES. My recent work is especially concentrated on neovascularization in myocardial tissue graft to reconstruct more functional tissue.

## TERMIS-North America Council Members

### Karen J.L. Burg, Ph.D.



Hunter Endowed Chair and Professor of Bioengineering at Clemson University. A graduate of North Carolina State University, Dr. Burg completed a tissue engineering postdoctoral fellowship at Carolinas Medical Center before joining the faculty at Clemson University. Dr. Burg has given over 200 invited presentations on the subject of engineered tissues, including multiple invited presentations at Gordon Research Conferences and National Academies meetings. She is the inventor of record on four patents and nine patent applications; technologies from her laboratory served as the basis for one spin-off company, Kiyatec. Karen has authored over 80 peer reviewed publications pertaining to injectable tissue engineered systems; she is the Executive Editor of *Biomaterials Forum*, the Editor-in-Chief of the *Journal of Histotechnology*, and the co-editor of a monograph series entitled "Advances in Polymeric Biomaterials". Honors to Dr. Burg include a Presidential Early Career Award for Scientists and Engineers, awarded by the President of the United States, the inaugural AO Research Prize, awarded by the AO Foundation in Switzerland, recognition as a Massachusetts Institute of Technology's TR100 Young Innovator, an American Institute for Medical and Biological Engineering Fellow, an American Council on Education Fellow, and a United States Department of Defense Era of Hope Scholar. Karen is the program chair for the 2009 Annual Meeting of the Society for Biomaterials and is serving on the Technical Program Committee for the 2008 Department of Defense Era of Hope breast cancer meeting.

### Jennifer Elisseeff, Ph.D.



A native of South Florida, Dr. Elisseeff attended Carnegie Mellon University (BS Chemistry, 1994) and received her PhD in Medical Engineering from the Division of Health Sciences and Technology (1999). Her doctoral research at the MIT with Robert Langer investigated new technologies for biomaterial implantation and cell encapsulation for tissue engineering. Dr. Elisseeff was then a fellow in the Pharmacology Research Associate Program working in the developmental biology laboratory of Yoshi Yamada at the National Institute of Dental and Craniofacial Research at NIH. In 2001, Dr. Elisseeff went to the Department of Biomedical Engineering at Johns Hopkins University as Assistant Professor. Her laboratory studies new synthetic-biological biomaterials, adult and embryonic stem cells, and tissue engineering applications in the musculoskeletal system and ophthalmology. In 2004, Elisseeff cofounded Cartilix, Inc. a startup that is translating adhesive and biomaterial technologies for cartilage

repair. Dr. Elisseeff is now an Associate Professor of Biomedical Engineering and Orthopedic Surgery and directs the Cell and Tissue Engineering Program in the Department of Biomedical Engineering at Johns Hopkins. She serves on the Scientific Advisory Board of Bausch and Lomb and Cellular Bioengineering Inc. Dr. Elisseeff has received awards including the Carnegie Mellon Young Alumni Award, Arthritis Investigator Award from the Arthritis Foundation, Yasuda Award from the Society of Physical Regulation in Medicine and Biology, and was named by *Technology Review* magazine as a top innovator under 35 in 2002 and top 10 technologies to change the future. She has published over 70 articles, book chapters and patents and given over 100 national and international invited lectures.

**Robert E. Guldberg, Ph.D.**

Dr. Guldberg received all of his degrees from the University of Michigan in Mechanical Engineering and Bioengineering. After finishing his Ph.D. in 1995, he completed a summer course in physiology at the Marine Biological Laboratory before beginning a post-doctoral fellowship in molecular biology. Dr. Guldberg is currently a Professor of Mechanical Engineering at the Georgia Institute of Technology and also holds an adjunct appointment in Biomedical Engineering. He has served as Director of the Orthopaedic Tissue Engineering Program within the Georgia Tech/Emory Center for the Engineering of Living Tissues (GTEC) since 1999. His research program has focused on the development and testing of strategies for promoting functional restoration of damaged or degenerated musculoskeletal tissues and is currently supported by the NIH, NSF, DoD, and several companies. In 2004, Dr. Guldberg was appointed Associate Director of the

Institute for Bioengineering and Bioscience at Georgia Tech. He was the Scientific Program Chair of the 5<sup>th</sup> Annual Regenerate International Conference & Exposition in 2005. Dr. Guldberg was recently elected to the College of Fellows of the American Institute for Medical and Biological Engineering (AIMBE) and holds an endowed Woodruff Faculty Fellowship at Georgia Tech. He also serves as the TERMIS-NA representative on the U.S. National Committee for Biomechanics and is a member of the Biotechnology Advisory Board of the AO Foundation based in Davos, Switzerland. Along with Barbara Boyan, Mark Van Dyke, and Molly Shoichet, Dr. Guldberg is one of the founding editors of a new book series based on research presented at the TERMIS-NA annual meetings and also serves on the editorial board of the journal *Acta Biomaterialia*. In March 2008, he will serve as Conference Chair of the Hilton Head Workshop on Regenerative Medicine: Advancing to Next Generation Therapies. Dr. Guldberg lives in Atlanta, Georgia with his wife Tina and two children, Sophia and Michael.

**Kam Leong, BD, PhD**

Dr. Leong is the James B. Duke Professor for the Department of Biomedical Engineering and the Division of Experimental Surgery. He received a BS in Chemical Engineering in 1977 at the University of California, Santa Barbara. From 1983-1986 he was a Research Associate in Applied Biological Sciences at the Massachusetts Institute of Technology. In 1987, Dr. Leong received his PhD at the University of Pennsylvania in Chemical Engineering.

Dr. Leong has served in several positions beginning from 1986-1991 where he was an Assistant Professor in Department of Biomedical Engineering, Johns Hopkins University; from 1991-1998 he was an Associate Professor in Department of Biomedical Engineering, Johns Hopkins University; 1998-2006 he was a Professor in Department of Biomedical Engineering, Johns Hopkins University; from 1990-2005 he was the Director of Master Program in Biomedical Engineering, Johns Hopkins University; 1998-2004 Dr. Leong was the Program Director and Technical Advisor to Institute of Materials Research and Engineering, Singapore; 1999-2006 he was the Principal Investigator, Division of Johns Hopkins in Singapore; and from 2006 to the present is the Professor in Department of Biomedical Engineering, Duke University; Professor in Division of Experimental Surgery, School of Medicine, Duke University; Director of Bioengineering Initiative, Duke University; Principal Investigator, Duke-NUS Graduate Medical School, Singapore.

Dr. Leong has received several honors including the Johnson-Johnson Postdoctoral Fellowship for Biomedical Research, MIT, 1983-1985; Young Investigator Research Achievement Award of Controlled Release Society, 1994; The Chinese-American Chemical Society Award for Recognition of Pioneering Contributions in Polymer Chemistry and Biomedical Engineering, 1995; Excellence in Guidance of Graduate Student Research, Controlled Release Society

1993: CRS-Proctor & Gamble Recognition Award  
1996: CRS-3M Pharmaceuticals Recognition Award  
1997: CRS-Cygnus Recognition Award;

Capsugel Award on Innovative Aspects of Controlled Release Research, Controlled Release Society: 1996, 1997, 1998, 2000, 2001; Fellow of American Institute for Medical and Biological Engineering, 1998; James B. Duke Professorship of Biomedical Engineering, 2007.

Dr. Leong has served as an Editorial Board Member: Molecular Therapy; Biomaterials; Acta Biomaterialia; Current Pharmaceutical Technology; J. Controlled Release; Nanomedicine: Nanotechnology, Biology, and Medicine; International Journal of Nanomedicine; Genetic Vaccines and Therapy; Nanomedicine. He has also published in Selected Peer-Reviewed Publications.

#### **Jeremy Mao, D.D.S., Ph.D**



Dr. Jeremy Mao is currently Professor and Director of Tissue Engineering and Regenerative Medicine Laboratory (TERML) at Columbia University. Dr. Mao is a dentist and scientist, having received a Doctor of Dental Surgery, oral surgery residency training, PhD and postdoctoral training. Dr. Mao's academic career started as an assistant professor at the University of Pittsburgh whereby his laboratory received funding from the National Institutes of Health and also from the Pittsburgh Tissue Engineering Initiative. Dr. Mao became an associate professor at the University of Illinois at Chicago where he was director of Tissue Engineering Laboratory. Dr. Mao has published over 100 scientific papers and book chapters in the area of tissue engineering, stem cells and regenerative medicine. He currently serves on the editorial board of several scientific journals such as Tissue Engineering, Journal of Biomedical Material Research, International Journal of Oral and Maxillofacial Surgery, and Journal of Dental Research, and has served as an Associate Editor of Stem Cells and Development, as well as on the editorial board of Medical Engineering and Physics and Frontiers of Bioscience. Dr. Mao is the editor of a new book entitled *"Translational Approaches in Tissue Engineering and Regenerative Medicine"*. Dr. Mao is also the editor of an upcoming textbook entitled *"Principles of Craniofacial Growth and Development"*. Dr. Mao is a fellow of American Institute for Medical and Biological Engineering. Dr. Mao has over 30 patents granted and/or filed in the areas of stem cells, tissue engineering, and regenerative medicine, leading to the incorporation of one biotechnology company.

Dr. Mao is currently a standing member of the Musculoskeletal Tissue Engineering Study Section of the NIH and serves on a number of review panels for NIH, NSF, US Army as well as many other grant review panels in over 18 different countries. Dr. Mao has been invited to give lectures at over 130 national and international conferences. Dr. Mao has attended and chaired multiple Regenerate/TERMIS conferences. He has also organized and chaired a number of scientific conferences including NIH-sponsored Stem Cells and Tissue Engineering Conference. Dr. Mao's laboratory is currently funded by several research grants from the National Institutes of Health and also from industry. Dr. Mao's laboratory has trained over 24 graduate students and postdoctoral research scientists, some of whom are faculty members at universities in the U.S. and overseas, whereas others are in biotech industry. Dr. Mao is a consultant to several Tissue Engineering and Regenerative Medicine Centers in the United States and overseas.

**Robert M. Nerem, Ph.D.**

Dr. Nerem joined Georgia Tech in 1987 as the Parker H. Petit Distinguished Chair for Engineering in Medicine. He currently serves as the Director of the Parker H. Petit Institute for Bioengineering and Bioscience. In addition he serves as the Director of the Georgia Tech/Emory Center (GTEC) for the Engineering of Living Tissues, an NSF-funded Engineering Research Center. He received his Ph.D. in 1964 from Ohio State University and joined the faculty there in the Department of Aeronautical and Astronautical Engineering, being promoted to Professor in 1972 and serving from 1975-1979 as Associate Dean for Research in the Graduate School. From 1979 to 1986 he was Professor and Chairman of the Department of Mechanical Engineering at the University of Houston. Professor Nerem is the author of more than 200 publications. He is a past President of the International Union for Physical and Engineering Sciences in Medicine (1991-1994) and also a past President of the International Federation for Medical and Biological Engineering (1988-91). In addition, he is a past Chairman of the U.S. National Committee

on Biomechanics (1988-91), and he is a Fellow and was the founding President (1992-1994) of the American Institute of Medical and Biological Engineering (AIMBE). He is past President of the Tissue Engineering Society International (2002-2004), and was a part-time Senior Advisor for Bioengineering in the new National Institute for Biomedical Imaging and Bioengineering at the National Institutes of Health (2003-2006). He is Fellow, American Association for the Advancement of Science; Fellow, Council of Arteriosclerosis, American Heart Association; Fellow, American Physical Society; and Fellow, American Society of Mechanical Engineers (ASME). He was Technical Editor of the ASME Journal of Biomechanical Engineering (1988-1997). In 1989 he received the H.R. Lissner Award from ASME and in 2002 the Pierre Galletti Award from AIMBE. In 1988 Professor Nerem was elected to the National Academy of Engineering (NAE), and he served on the NAE Council for six years (1998 - 2004). In 1992 he was elected to the Institute of Medicine of the National Academy of Sciences and in 1998 a Fellow of the American Academy of Arts and Sciences. In March 1990 Professor Nerem was presented with an honorary doctorate from the University of Paris, and in 1994 he was elected a Foreign Member of the Polish Academy of Sciences. In 1998 he was made an Honorary Fellow of the Institution of Mechanical Engineers in the United Kingdom, in 2004 he was elected an honorary foreign member of the Japan Society for Medical and Biological Engineering, and in 2006 a Foreign Member of the Swedish Royal Academy of Engineering Sciences. Professor Nerem serves on the scientific advisory board of AtheroGenics, Inc and Tengion, Inc. Research interests include atherosclerosis, biomechanics, cardiovascular devices, cellular engineering, vascular biology, and tissue engineering and regenerative medicine.

**Laura E. Niklason, M.D., Ph.D.**

Dr. Niklason is an Associate Professor of Anesthesia and Biomedical Engineering at Yale. She received her Bachelors degrees in Physics and Biophysics from the University of Illinois, and went on to the University of Chicago for her PhD in Biophysics in 1988. Dr. Niklason subsequently received her MD from the University of Michigan, where she did her internship. She then went on to the Massachusetts General Hospital for residency in Anesthesia, followed by fellowship training in Critical Care Medicine. During her time in Boston, Dr. Niklason was also a post-doctoral researcher at MIT with Dr. Robert Langer, where she developed techniques for the tissue engineering of autologous arteries. Dr. Niklason joined the faculty at Duke University in 1998, where she continued her work in cardiovascular tissue engineering, and founded a biotechnology company designed to bring tissue engineered cardiovascular products to the clinic. Dr. Niklason has received national and international recognition for her work in this field, receiving the Discover Magazine award for Technological Innovation in 2000, and being named a Hunt Scholar in the Duke School of Engineering in 2001. In January of 2006, Niklason moved to Yale University, where she is expanding her research program in tissue engineering and in understanding the basic aspects of cellular aging.

Currently, Dr. Niklason's research program has several areas of focus. With regard to engineered arteries, Niklason is engaged in preclinical studies in large animals to validate the method for generating engineered tissues that are available "off the shelf". Large animal studies on vascular grafts are centered on immune/inflammatory response minimization to these off-the-shelf tissues, and on the long-term function of the grafts in the arterial circulation. In addition, Niklason is developing tissue engineering approaches to generating vascularized cardiac muscle, as well as vascularized lung tissue. In addition, Niklason has active research interests in vascular remodeling that is associated with various disease states, including atherosclerosis and arterial vasospasm.

## Newly Appointed Member-At-Large, North America: Cato Laurencin, M.D., Ph.D.

Dr. Cato Laurencin was nominated by the TERMIS-NA as the new Member-At-Large, North America. Dr. Stephen Badylak was elected as the President-Elect of TERMIS. This left a vacancy in the Member-At-Large, North America position. The TERMIS-NA Council appointed Dr. Cato Laurencin to complete the rest of the term and he graciously accepted. We would like to welcome Dr. Laurencin as a member of the TERMIS Governing Board and North American Council!



Dr. Laurencin is the Pratt Distinguished Endowed Professor of Orthopaedic Surgery and the Orthopaedic Surgeon-in-Chief of the University of Virginia Health System. He is Professor of Biomedical Engineering and Professor of Chemical Engineering at UVA. In addition he has earned the title 'University Professor', the highest professorial rank at the University of Virginia, designated by the President.

Dr. Laurencin received his B.S.E. in Chemical Engineering from Princeton University, his Ph.D. in Biochemical Engineering/Biotechnology from the Massachusetts Institute of Technology where he was a Hugh Hampton Young Scholar, and his

M.D. from the Harvard Medical School where he graduated Magna Cum Laude.

Dr. Laurencin is a specialist in Shoulder Surgery and Sports Medicine and has been honored in being named to America's Top Doctors and America's Top Surgeons. Dr. Laurencin serves on the editorial boards of 14 Journals including The Journal of Biomedical Materials Research, Biomaterials, Applied Biomaterials, Tissue Engineering, and the Journal of Biomedical Nanotechnology. He serves on the Board of Directors of the American Institute for Medical and Biological Engineering where he currently is Chair of the College of Fellows for the Institute, and the Board of Directors of the Cobb/National Medical Association Health Institute where currently serves as Chair of the Board.

Dr. Laurencin has been a member of the NIH National Advisory Council for Arthritis Musculoskeletal and Skin Diseases (NIAMS), the National Science Advisory Board for the FDA, and the National Science Foundation Advisory Committee for Engineering.

Dr. Laurencin has numerous research interests which include tissue engineering, biomaterials, nanotechnology, drug delivery, stem cell biology and gene therapy. Honored at the White House, Dr. Laurencin received the Presidential Faculty Fellowship Award from President William Clinton in recognition of his research work involving medicine and engineering. Most recently, Scientific American Magazine honored Dr. Laurencin with its SCIAM 50 award for the 50 greatest scientific achievements during 2007.

Dr. Laurencin is an elected member of the Institute of Medicine of the National Academy of Sciences. He is also an elected member of the Third World Academy of Sciences.

## 2009 2<sup>nd</sup> TERMIS World Congress

In

*Daejeon, South Korea at the  
Daejeon International Convention Center*

From

**August 31 – September 3, 2009**

*In Conjunction with the  
2009 Seoul Stem Cell Symposium*

[www.termis.org/wc2009](http://www.termis.org/wc2009)

Conference President: Dr. Shin-Yong Moon

Honorary Presidents: Drs. Hai Bang Lee, Jeong Man Kim, Kwang Won Kim and Chong Su Cho

Organized by:

The Tissue Engineering and Regenerative Medicine International Society  
The Korean Tissue Engineering and Regenerative Medicine Society  
Stem Cell Research Center

Contact:

Prof. Gilson Khang

+82 19 410 7579 or [gskhang@kRICT.re.kr](mailto:gskhang@kRICT.re.kr) or [gskhang@conbuk.ac.kr](mailto:gskhang@conbuk.ac.kr)



**Tissue Engineering**, Official Journal of the Tissue Engineering and Regenerative Medicine International Society, has been receiving increasing numbers of excellent reviews and methods papers. **Tissue Engineering** (Part A) has traditionally focused on hypothesis-driven scientific reports. The **Reviews** and **Methods** journals will enable the flagship **Tissue Engineering** to bring these valuable papers to the readership on a much larger scale.

**Mary Ann Liebert, Inc. publishers, would like to announce that**

*Tissue Engineering*: Parts B and C are now accessible online to TERMIS members free via the secure login.

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This new journal meets the urgent need for high-quality review papers due to the rapid expansion of the field. The Journal presents critical discussions, analyses, and concise summaries of research in different aspects of the field to assess where we are now and future directions.

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## Upcoming Meetings Endorsed by TERMIS

### April 2008

- [GTCbio 4th Stem Cell Research & Therapeutics Conference](#)

Conference Dates: April 17-18, 2008

Conference Location: Omni Parker House Hotel, Boston, MA



### May 2008

- [8th World Biomaterials Congress](#)

Meeting Dates: May 28 through June 1

Conference Location: RAI Conference Centre in Amsterdam, The Netherlands.

Please contact [info.wbc2008@ics-online.nl](mailto:info.wbc2008@ics-online.nl) for further details.



- [3rd Biennial Heart Valve Biology and Tissue Engineering](#)

Conference Dates: 4th-7th May 2008

Conference Location: The Royal Society, London

Abstract Deadline: 15th January 2008

- [CTTE 2008 - Cell Based Therapies & Tissue Engineering Short Course](#)

Conference Dates: May 19-23, 2008

Conference Location: Cleveland, Ohio at Case Western Reserve University



**July 2008**

- [European Society of Biomechanics](#)  
Conference Dates: July 6-9, 2008  
Conference Location: Lucerne, Switzerland
- [XX International Fibrinogen Workshop](#)  
Conference Dates: 10-13 July 2008  
Conference Location: Venice, Italy

**August 2008**

- [Advances in Tissue Engineering Short Course](#)  
Conference Dates: August 13-16, 2008  
Location: Rice University Campus, Houston, Texas

*Please note that members of endorsing societies receive the discount fee of \$1095 and graduate degree candidates may be eligible for the discount fee of \$495.*

**September 2008**

- [3rd International Conference on Tissue Engineering](#)  
Conference Dates: September 21-16, 2008  
Conference Location: Rhodes, Greece  
Conference Chair: Dr. Antonios G. Mikos
- [ESAO Annual Meeting](#)  
Conference Dates: 3-6 September 2008  
Conference Location: Geneve, Switzerland  
Deadline for Abstracts: 1 April 2008

**November 2008**

- [bone-tec 2008 - International Bone Tissue Congress](#)  
Conference Dates: 7 - 9 November 2008  
Conference Location: Hanover, Germany  
[2nd Announcement - Call for Abstracts](#)



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