

# The Microcirculatory Society, Inc.

## Newsletter

Volume 28, Number 4

Spring, 2001

### Contents

President's Message  
Lots of Meeting Information  
New Officers  
MCS Award Winners  
World Congress Information  
Secretary's Farewell



**President**     **Walter Durán**  
[duan@umdnj.edu](mailto:duan@umdnj.edu)  
**President-elect**   **Ingrid Sarelius**  
[ingrid\\_sarelius@urmc.rochester.edu](mailto:ingrid_sarelius@urmc.rochester.edu)  
**Secretary:**     **Mary Ellsworth**  
[ellsworthm@slu.edu](mailto:ellsworthm@slu.edu)  
**Treasurer:**     **Ann Baldwin**  
[abaldwin@u.arizona.edu](mailto:abaldwin@u.arizona.edu)  
**Web Site:**     <http://microcirc.org>

**Note:** All the blue highlighted text **SHOULD** take you directly to the specified location

## *President's Message*

### *Walter Durán*

We are looking forward to an active annual meeting in Orlando, and to an opportunity to visit with scientists from the worldwide microcirculatory societies in Sydney. The meeting's schedule with more detailed information on the poster sessions, workshop and symposia will be published shortly in our web page and in the American Physiological Society's web page. Important information concerning our annual meeting is already posted in our web site at <http://microcirc.org>. Please visit our web site frequently for updated information as we approach the date of the meeting.

As announced earlier, our meeting will feature a Young Investigators Symposium this year. Samina Kanwar, a member of our Program Committee, chaired an ad hoc sub-committee that organized this symposium. I invite you to support the growth of our Society by attending the Young Investigator Symposium (Saturday, March 31, 1:00 p.m. – 3:00 p.m.) as well as the President's Symposium (Saturday, March 31, 3:15 p.m. – 5:15 p.m.).

Our meeting will also highlight a workshop focused on "Clinical Applications of Intravital Microscopy". The workshop, to be held on Saturday morning (10:00 a.m. – noon), will be chaired by Bruce Klitzman and Anthony Harris. The scheduled talks should be of interests to both basic and clinical scientists with an interest in the microcirculation and in cardiovascular disease. Please encourage your clinical colleagues to attend this workshop.

Our only MCS scheduled activity for Sunday is the Landis Award Lecture. The Awards Committee has selected Donald D. Heistad as the recipient of the 2001 Landis Award. Let's recognize Don's significant contributions to advancing knowledge in the field of cerebral microcirculation by attending his Landis Lecture on Sunday at 2:00 p.m.

On the subject of the Annual Meeting, our Executive Council will discuss the advantages/disadvantages of increasing the overlap of our meeting with Experimental Biology. If you have not done so yet, please e-mail your views and comments to the members of the Program Committee and the members of the Executive Council. Their addresses are listed in the Society's web page.

The campaign to recruit new members has been a theme in my messages this year. The future of our Society resides, in part, in our ability to attract new members to be actively engaged in the fields of microcirculation and microvascular biology. We should extend an invitation to our colleagues in the clinical sciences to incorporate studies of microvascular pathophysiology in their research. We should also invite them to consider becoming regular members of MCS. Along these lines, I congratulate Debbie Damon, the members of the Membership Committee, and the MCS membership for recruiting a sizeable number of new members this year. Keep up the good work!

This has been a year of interesting activities for MCS. All the Committees were involved in furthering the goals of the Society. Ingrid Sarelius and members of the International Committee represented us at the European Microcirculatory Society Meeting last June and collaborated with the World Congress for Microcirculation Organizing Committee in defining the areas of interest for symposia. The International Committee, headed by Ingrid, shared these tasks also. Bill Chilian and the Awards Committee have been busy evaluating the nominations submitted by the membership for the various MCS Awards. Ann Baldwin and the Finance Committee, among other achievements, have succeeded in implementing a cyber-system to allow the membership to pay their dues on-line. Herb Lipowsky and the Development Committee are looking for innovative ways to obtain support for the activities of our Society. One of their current mid-range goals is to secure the necessary financial support for the next World Congress of Microcirculation that we will host in 2005. Gene Renkin and the Historical Committee are working towards the goal of organizing, classifying and providing proper storage for the valuable archival materials and records. Sarah Yuan and the Nominating Committee did an excellent job of conducting the Society's processes of Nomination and Election of New Officers. They accounted for all imaginable chads in the recent election. Ron Tuma and the Long Range Planning Committee have been involved in issues related to revision of our Bylaws and changes in the Manual of Operations of our Society. Julian Lombard has served as a leader in the latter initiative. Through the Program Committee, we have interacted with the American Physiological Society's Joint Program Committee in the design and implementation of initiatives for EB 2001 and EB 2002. Bob Gore and the Publications Committee in tandem with Neil

Granger and his Associate Editors are doing a good job of advancing the status and impact of *Microcirculation* in the constellation of scientific journals.

Congratulations to the newly elected MCS officers. They have an exciting challenge ahead of them. Also, on behalf of the Society, I would like to thank all the candidates for their willingness to stand for office and to serve if elected

I take this opportunity to thank you all for the opportunity of serving the Society as President for this year. I had excellent assistance from the officers of the Society. I thank each one of them with deep gratitude for their help. Ingrid and Ron have been available for consultation and advice.

The members of Council have also provided me with the wisdom of their advice on specific issues. Ann Baldwin has managed to keep the Society in good financial status. Bob Gore continues to provide an excellent service to the Society as our web master. Bob plays a key role in maintaining an updated flow of information to all of us. Mary Ellsworth deserves special recognition and thanks for her work as MCS Secretary. She survived four Presidents during her tenure of office and maintained high quality in the conduct of our Society's business. Mary provided excellent and timely advice on "constitutional" matters and guidance on all the aspects of the management of the Society.

Thanks for the honor and privilege of serving as the 45<sup>th</sup> President of The Microcirculatory Society. I look forward to seeing you at our Annual Meeting in Orlando!



# Meeting Information

The 2001 meeting of the Microcirculatory Society will be held March 30-April 1 in Orlando, Florida. Our meeting is being held prior to and in conjunction with Experimental Biology 2001. Posters will be presented Friday afternoon and Saturday morning. The Young Investigator Symposium will be held from 1:00 until 3:00 on Saturday March 31 just prior to the President's symposium entitled "Signaling Mechanisms of Endothelial Nitric Oxide Synthase." The Landis Award Lecture is scheduled for Sunday, April 1st. It will be presented by Donald D. Heistad, M.D., Professor of Medicine, University of Iowa College of Medicine. The title of his talk is: "What's New in the Cerebral Microcirculation?" The Business meeting will be held Friday afternoon with the Executive Council meeting scheduled for Friday morning beginning at 8:00 in the Rosen Centre Hotel, Salon 19. The Banquet is scheduled for Saturday evening also at the Rosen Centre Hotel, Grand Ballroom D beginning with a cash bar at 6:00 followed by dinner at 7:00. Additional details will be forthcoming in late February. Look for an e-mail with attached PDF file which will contain the ticket request form and menu choices.

For those of you who did not pre-register for the meeting, registration will be opening Friday at 1:00 in the Orange County Convention Center so you will be able to register and get a name badge at that time so you won't have to attend *incognito*.

## **MCS-Sponsored WORKSHOP (Supported by Cytometrics, Inc.) Saturday, March 31, 2001**

### **“Clinical Applications of Intravital Microscopy” Chairs: Bruce Klitzman and Anthony Harris**

- 10:00 - 10:05 Introduction: Anthony Harris
- 10:05 - 10:20 “Orthogonal Polarization Spectral Imaging: Advantages and Limitations”  
Roland Pittman
- 10:20 - 10:35 “Wound Healing and Reconstructive Surgery”  
Bruce Klitzman
- 10:35 - 10:50 “Trauma Surgery and Transplantation”  
Klaus Shaser
- 10:50 - 10:55 Group Discussion
- 10:55 - 11:10 “Critical Care Medicine and Shock”  
Jean-Louis Vincent and Daniel De Becker
- 11:10 - 11:25 “Anesthesiology, Brain Tumors, and GI Surgery”  
Can Ince
- 11:25 - 11:40 “Cardiac Surgery and Neonatal Transdermal imaging”  
Frank Christ
- 11:40 - 11:55 “Burn evaluation in humans”  
Stephan Langer
- 11:55 - 12:00 Group Discussion and Concluding Remarks: Bruce Klitzman

MCS President's Symposium (sponsored by Cytometrics, Inc.)  
 Saturday, March 31, 2001  
 3:15-5:15  
 Orlando Convention Center  
 Rm 312 A/B

## *"Signaling Mechanisms of Endothelial Nitric Oxide Synthase."*

**Chairman: Walter N. Durán**

**Speakers:**

- 3:15 **William C. Sessa, Ph. D.:** "Control of nitric oxide production by phosphorylation"  
 3:45 **Mauricio P. Boric, Ph. D.:** "Translocation of nitric oxide synthase as a signaling mechanism in vivo".  
 4:15 **Jan Schnitzer, M. D.:** "Mechano-activation of vascular endothelium via eNOS and caveolae"  
 4:45 **Thomas Michel, M. D., Ph. D.:** "New pathways in endothelial nitric oxide synthase signal transduction".

### POSTER SESSION PREVIEW

The Poster Sessions of the Microcirculatory Society are organized as follows for their presentation at the Annual Meeting:

**Friday, March 30**

New #	SESSION TITLE	# ABSTS
1.	Microvascular cell interactions	12
2.	Cell and molecular biology	12
3.	Ischemia/reperfusion	8
4.	Flow regulation; oxygen delivery	7
5.	Clinical microcirculation	4
6.	Instrumentation	4
7.	Microvascular networks	5
8.	Microvascular mechanics and hemodynamics	20
	<b>TOTAL ABSTRACTS—FRIDAY</b>	<b>72</b>

**Saturday, March 31**

New #	SESSION TITLE	# ABSTS
1,	Microvessel permeability/exchange	26
2.	Microvascular pharmacology/vascular control	25
3.	Angiogenesis/microvascular remodeling	9
	<b>TOTAL ABSTRACTS—SATURDAY</b>	<b>60</b>



## *New Officers*

President-Elect: [Paul McDonagh](#)  
Secretary: [Cindy Meininger](#)  
Councillors: [Matthew Boegehold](#)  
[Robert Hester](#) or  
[Andrew Greene](#)



## *Annual Society Awards*

**The 2001 MCS Awards are:**

*Eugene M. Landis Award*

**Donald D. Heistad, M.D.**

University of Iowa College of Medicine

*August Krogh Young Investigator Award*

*(supported for 2001 by Fine Science Tools, Inc.)*

**Fuzsina K. Johnson, Ph.D.**

Department of Physiology

Tulane University.

"Carbon Monoxide Promotes Endothelium-Dependent Constriction of Isolated Gracilis Arterioles."

*Christian Crone Travel Award*

**Vladimir V. Matchkow, Ph.D.**

Department of Physiology

University of Aarhus

*Excellence in Lymphatic Research*

**Randolph H. Stewart, D.V.M., Ph.D.**

Department of Veterinary Physiology and Pharmacology,

Texas A & M University.

"Flow in Lymphatic Networks: Interaction between Hepatic and Intestinal Lymph Vessels"

*Zweifach Student Awards*

**Michael B. Kim**

Department of Biophysics

University of Rochester

**Zoltan Ungvari**

Department of Physiology

New York Medical College

The Society thanks Bill Chilian and the members of the Awards committee for their efforts. We congratulate all the winners.

*2001 Zweifach Award  
to be Presented at the World Congress in  
Sydney, Australia*



David Shepro, Ph.D.  
Department of Biology,  
Boston University

## Dr. Leslie Ritter Wins Prestigious National Award

Dr. Leslie Ritter, Assistant Professor in the College of Nursing at the University of Arizona, Tucson, Arizona, was selected as one of 59 national recipients to receive the prestigious PECASE Award. The PECASE Award (Presidential Early Career Award for Scientists and Engineers) is the highest honor bestowed by the United States Government on young professionals at the outset of their independent research careers. The award was established by President Clinton in 1996 to honor outstanding scientists and engineers. The young scientists and engineers receive up to a five-year research grant to further their study. Eight federal agencies join together annually to nominate meritorious young investigators who will broadly advance the science and technology that will be of the greatest benefit to fulfilling the agencies' missions. The federal agencies involved include the Departments of Agriculture, Commerce, Defense, Energy, Health and Human Services Veterans Affairs, the National Aeronautics and Space Administration, and the National Science Foundation. Dr. Ritter was nominated by the National Institutes of Nursing Research of the National Institutes of Health through the Department of Health and Human Services. The title of her NIH NINR grant is: "Inflammatory and thrombotic interactions after stroke".



Dr. Ritter traveled to Washington, D.C., where Dr. Neil Lane, Director of the White House Office of Science and Technology, presented the awards in a White House ceremony on October 24, 2000. The NIH awardees were also honored at a reception that day at the National Institutes of Health. Congratulations to Dr. Ritter from all the members of the Microcirculatory Society, Inc., on receiving this most prestigious honor!

## 7th World Congress for Microcirculation, Sydney, Australia, August 19-23, 2001

Angiogenesis is of increasing interest for researchers in the area of microcirculation and vascular biology. At the upcoming World Congress for Microcirculation, this topic will be highlighted for the first time by an event called "Spotlight on Angiogenesis". This event will include 8 coordinated symposia, a plenary talk and related free communications. It will address aspects integrating molecular insight with functional concepts of the terminal vascular bed. An important goal is to advance beyond reductionist approaches to consider the interplay of multiple signals needed to create fully functional networks of new vessels.

### **SPOTLIGHT ON ANGIOGENESIS: What generates functional blood vessels?**

**PLENARY (Monday, August 20, 2001, 8:30):**  
**George Yancopoulos (Regeneron Pharmaceuticals):**  
*"Collaborative and complimentary roles of VEGF, angiopoietins,  
and ephrins during normal and pathological angiogenesis"*

#### **SYMPOSIA**

Sunday, August 19, 2001:

Morning: Ken Knight, Wayne Morrison:  
*Artificial blood vessels and tissue engineering*  
Afternoon: Mary Gerritsen:  
*Therapeutic angiogenesis*

Monday, August 20, 2001:

Morning: A. Zakrzewicz, S. Egginton A.R. Pries, T.C. Skalak:  
*Role of hypoxia and mechanical factors in angiogenesis*  
Afternoon: Lucilla Poston:  
*Molecular and functional aspects of vascular development*

Tuesday, August 21, 2001:

Morning: Ed VanBavel, Michael J. Mulvany:  
*Control of arteriolar remodeling by mechanical factors*  
Afternoon: T.C. Skalak, A.R. Pries, P. Gaehtgens:  
*From mechanisms to networks*

Wednesday, August 22, 2001:

Morning: Helena Parkington, Peter Rogers:  
*Vascular function and reproduction*  
Afternoon: Hartwig Wolburg:  
*From angiogenesis to blood-brain barrier*

#### **FREE COMMUNICATIONS**

The organisers of the Spotlight and the individual symposia would be very happy if you decided to participate in these events by submitting a free communication. Details can be obtained from the website (<http://www.ozemail.com.au/~worldcongress>) or from the Congress President, Prof. Michael Perry (School of Physiology & Pharmacology, University of NSW, Sydney, NSW 2052, Australia, phone: +61-2-93 85 25 56, fax: +61-2-93 85 10 59, e-mail: [m.perry@unsw.edu.au](mailto:m.perry@unsw.edu.au)) or by attending the conference which will also cover other topics of high interest, e.g. Control of Blood Vessel Wall, Inflammation, Clinical, Techniques.

**Don't Forget!!!! It is not too late!!!!**

**Make your Plans to Attend the**

**7th World Congress for Microcirculation, Sydney, Australia  
19-23 August, 2001.**

**Information is available on their Website:**

<http://www.ozemail.com.au/~worldcongress/>



***Don't Forget to check our Web site!***  
***<http://microcirc.org>***



### ***A Secretary's Farewell***

I would like to thank the Society for providing me with the privilege of serving as Secretary for the past 4 years. It has been an interesting time in our Society. We returned to self management which, has put us on more stable ground. We now have a reasonable handle on our membership list. We have begun to utilize the internet and all of its vast resources to maintain contact with our members through our web site thanks to the heroic efforts of Bob Gore. The use of an electronic newsletter has speeded up communication to the Society as a whole and the searchable directory has aided intermember communication. Dues payment on line has helped many of us busy, forgetful souls to pay our dues. I would encourage the membership to get more involved in the Society, help it enhance its strengths and reverse its weaknesses. Each of you does make a difference. It is only through the efforts of us all that the Society can continue to be a vital force as it approaches its 50th anniversary in 2004. I want to thank all the officers with whom I have worked these past four years. It has been an interesting and worthwhile experience. I wish Cindy Meininger well and hope that all of you will provide her with the same support I have been fortunate enough to have had.

***Hope to see you all in Orlando!***

