

## CURRICULUM VITAE

### PERSONAL INFORMATION

**Name:** Diomedes E. Logothetis  
**Title:** Professor and John D. Bower Chair of Physiology & Biophysics  
**Institution Name:** Virginia Commonwealth University  
**Business Address:** Department of Physiology and Biophysics  
1101 East Marshall Street  
P.O. Box 980551  
**City, State, Zip:** Richmond, VA 23290-0551  
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### PROFESSIONAL SUMMARY

#### **Primary Departmental Program Area:**

#### **Research Interests:**

Molecular Physiology, Neurobiology and Cardiac Physiology  
Molecular Mechanisms of Signal Transduction  
Modulation of Ion Channel Activity by  
Phosphatidylinositol-bis-Phosphate (PIP<sub>2</sub>)  
Modulation of Ion Channel Activity by GTP-binding Proteins  
Gating Mechanism of Potassium Channels

### EDUCATION

#### **POSTGRADUATE:**

1989-1993 Research Associate, Howard Hughes Medical Institute,  
Department of Cardiology, Children's Hospital, Boston  
(Bernardo Nadal-Ginard)  
1987-1989 Department of Cardiology, Children's Hospital, Boston,  
(Bernardo Nadal-Ginard) & Dept. of Cellular & Molecular  
Physiology, Harvard Medical School (HMS) (Peter Hess)

#### **GRADUATE:**

1987 Ph.D., Harvard University (Physiology and Biophysics, Mentor:  
David Clapham)  
1981 M.A., Northeastern University (Psychology, Mentor: Michael  
Terman)

#### **UNDERGRADUATE:**

1980 B.A., Northeastern University (NU) (Physics)

## **ACADEMIC APPOINTMENT HISTORY**

2008 -	Professor and John D. Bower Chair of Physiology and Biophysics, Virginia Commonwealth University (VCU) School of Medicine (SOM), Richmond, VA.
2008 -	Adjunct Professor of Structural and Chemical Biology, Mount Sinai School of Medicine (MSSM)
2003-2007	Director, MD/PhD Program, MSSM, NYU
2002-2006	Dean, Graduate School of Biological Sciences, MSSM, NYU
2002-2008	Vice Chair, Dept. of Molecular Physiology and Biophysics/ Structural & Chemical Biology, MSSM, NYU
2002-2007	Professor, Molecular Physiology and Biophysics/ Structural & Chemical Biology, MSSM, NYU
1997-2002	Associate Professor, Physiology and Biophysics, MSSM, City University of New York (CUNY)
1993-1997	Assistant Professor, Physiology and Biophysics, MSSM, CUNY
1987-1993	Instructor, Cellular and Molecular Physiology, HMS

## **EMPLOYMENT HISTORY (Management)**

- 2008 (Jan) - John D. Bower Chair of Physiology and Biophysics
- Recruited 5 junior faculty (Carlos Escalante, Qinglian Liu, I. Scott Ramsey, Montserrat Samso, and Lei Zhou), 3 senior faculty (Louis De Felice, Jason Rife, Leon Avery). Promoted Liya Qiao to Assistant Professor in the tenure track from the research track faculty. These recruitments/promotions have more than doubled the number of active independent laboratories in the department to 16 (including my own lab) in my 5-year tenure as Chair.
  - Completely restructured the departmental administrative team. Research sponsored activities exceed \$5M in direct and indirect annual funds.
  - Re-vitalized research and educational activities of the department. Examples include the creation of the Molecular Biophysics group bringing expertise in crystallography, NMR, cryo-electron microscopy, computational biology towards an understanding of molecular function. Instituted a lab rotation program for all incoming PhD students, re-structured curriculum and introduced *journal clubs* and *works in progress* events for students and postdocs.
- 2003 (Jan) -2007 (July) MD/PhD Director, Mount Sinai School of Medicine
- Programmatic Changes and New Initiatives*
- PhD to MD/PhD Track
  - MD to MD/PhD Track
  - One month long clinical clerkship before transitioning to PhD phase
  - Translational Research Course
  - Clinical Refresher
  - Residency choices for MD/PhD candidates
  - Annual Meetings with each student in the program

2002 (Nov) -2006 (Oct) Dean of Biological Sciences, Mount Sinai School of Medicine, New York, NY

- 1. Programs of Study** (a total of **422** students)
- PhD in Biomedical Sciences (**181** students / 180 graduate faculty)
  - PhD in Neurosciences (New)
  - MD/PhD Program (MSTP: 20 slots funded by NIGMS; **85** students /180 graduate faculty)
  - Masters in Biomedical Sciences - MS (New)
  - PREP-Med Program (New – **30** students) (tuition bearing \$23K/student/year)
  - Masters in Clinical Research (**27** students)
  - Masters in Genetic Counseling (**12** students)
  - Masters in Public Health / Community Medicine (**75** students)
  - Masters in Dermatology (New)
  - PREP (open to minorities; **12** students)

**2. Curriculum Achievements**

*Qualifying Exam*

- Promotions Committee Meetings for First Year Students
- Predoctoral Proposal Requirement
- Scientific Writing Workshop

*Innovative Initiatives*

- Meet the Mount Sinai Authors
- Rotation Presentations and Feedback
- Early Assurance of Admission for Summer Undergraduate Research Program (New)
- Restructuring of the Multidisciplinary Training Areas - MTAs
- Annual Meetings with each advanced (2<sup>nd</sup> year and above) student
- Frequent Meetings with "Students in Trouble"

*Courses*

- Methods in Biomedical Sciences
- Biostatistics
- Responsible Conduct in Research
- Introduction to Journal Club
- Training Area Journal Clubs
- MTA Seminar Program (implementation to follow restructuring of MTAs)

**3. Administrative Achievements**

*Annual Budget* (\$4.0 M from Dean's office and ~\$700K from new MS program)

- 55% towards stipend support (100% for 1<sup>st</sup> year and 25% for 2<sup>nd</sup> year PhD students, 20% for 1<sup>st</sup> and 2<sup>nd</sup> year and 25% for 3<sup>rd</sup> year MD/PhD students)
- 20% towards administrative salaries
- 25% towards programmatic costs

*Admissions*

- Streamlined Admissions Process (study section model)

- Summer Undergraduate Research Program (SURP)
- Early Assurance of Admission (EAA) to PhD and MD/PhD for SURP students
- Earlier deadlines for application to the PhD and MD/PhD programs

#### Community

- Student/Faculty Luncheons (1<sup>st</sup> year students seeking rotation mentors)
- Career Dinners
- Feedback luncheons
- Receptions following weekly seminars
- Happy Hours (Graduate students/Postdocs/Faculty)
- Retreats for MD/PhD program and for Graduate School at large
- Graduate School Newsletters

#### Organization

- Deadlines for Qualifying Exams (end of second semester) and Thesis Proposal (end of fifth semester)
- Advisory Committee Meetings reorganization (to follow restructuring of MTAs)
- Monthly Curriculum/Steering Committee Meeting (student membership)
- Online registration and pre-registration

#### Innovative Initiatives

- Roommate matching
- Video streaming of First year courses

#### Awards

- Travel Awards
- Prizes for successful F30, F31 or equivalent grant recipients
- Student Service Awards
- Research Achievement Awards
- Dissertation Awards

#### Alumni

- Alumni tracking and updates

2002-2008

Vice Chairman, Department of Molecular Physiology and Biophysics/ Department of Structural and Chemical Biology, MSSM

*Key role in permanent Chair search for the Department of Physiology and Biophysics*

- Worked closely with two interim chairs (Carter Bancroft and Ming Ming Zhou) and current permanent chair (Ming Ming Zhou)
- Helped negotiate with Administration departmental space restructuring
- Led the departmental efforts in teaching medical and graduate students

### **AWARDS AND HONORS**

2008  
2005

Outstanding Mentor Award, MSSM  
Student Council Appreciation Award, MSSM

2002	Excellence in Teaching Award, first year graduate students, MSSM
2001	Excellence in Teaching Award, first year graduate students, MSSM
2000	Excellence in Teaching Award, first year graduate students, MSSM
1992	Excellence in Teaching Award, first year medical students, HMS, Class of 1995
1986-1987	Albert J. Ryan Fellow, Division of Medical Sciences, HMS
1980	Avrom Aaron Leve Award, Outstanding Psychology Student, NU

### **MEMBERSHIP IN PROFESSIONAL SOCIETIES:**

2000-	Alliance for Cellular Signaling
1995-	New York Academy of Sciences
1994-	American Association for the Advancement of Science
1986-	Biophysical Society
2008-	American Physiological Society

### **SCIENTIFIC AND SCHOLARLY ACTIVITIES**

#### **GRANTS: ACTIVE/PENDING**

*Principal Investigator:* Diomedes E. Logothetis

*Active/Pending:* Active

*Project Number (Principal Investigator):* R01HL59949-09; Diomedes E. Logothetis

*Source:* NIH/NHLBI

*Title of Project (and/or Subproject):* Structural Determinants of PIP<sub>2</sub> Regulation

*Dates of Approved/Proposed Project:* 6/1/07-5/31/16

*Annual Direct Costs / Percent Effort:* \$250,000; 15%

The major goals of this project are on one hand the identification of the gating structure controlled by channel-PIP<sub>2</sub> interactions and on the other the development of experimentally testable models of Kir channel-PIP<sub>2</sub> interactions. Finally, the dependence of voltage-gated channels related to Kv1.2 on PIP<sub>2</sub> will be explored with particular emphasis on physiological and structural implications.

*Overlap (summarized for each individual):* None

*Principal Investigator:* Diomedes E. Logothetis

*Active/Pending:* Active

*Project Number (Principal Investigator):* R01HL090882-01; Diomedes E. Logothetis

*Source:* NIH/NHLBI

*Title of Project (and/or Subproject):* Modulation of Kir Channel Function by Phosphorylation

*Dates of Approved/Proposed Project:* 4/1/09-3/31/13

*Annual Direct Costs / Percent Effort:* \$250,000; 15%

The major goals of this project are a) to study the effect of reported PKC-, PKA-, and TK-phosphorylation mutants of the channel on its sensitivity to PIP<sub>2</sub> b) to identify in vitro and in vivo phosphorylation sites of Kir3 channels by Mass Spectrometry (MS) and their effects on PIP<sub>2</sub> sensitivity, and c) to study in vivo phosphorylated sites in native myocytes and cardiac cell lines through use of phosphospecific antibodies generated in parts (a) and (b).

*Overlap (summarized for each individual):* None

## **GRANTS: PAST**

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|-----------|--|
| 2003-2012 | National Institutes of Health, National Institute of General Medical Sciences (NIGMS), <u>Title:</u> Mount Sinai Medical Scientists Training Program. <u>Direct overall funds:</u> \$1,013,791; Years 2-5: \$1,158,618 (7/1/07-6/30/12 being transferred to new Program Director, Dr. Lisa Satlin) |
| 2005      | National Institutes of Health, NIEHS – Office of Rare Diseases, <u>Title:</u> FASEB Conference: Ion Channel Regulation. <u>Direct overall funds:</u> \$25,000; Supplemented R13HL082354 and NSF 0509719 awards for 2005 FASEB Summer Research Conference (Snowmass, CO).                           |
| 2005      | National Institutes of Health, National Heart, Lung and Blood Institute, 1R13HL082354-01 <u>Title:</u> FASEB Conference: Ion Channel Regulation. <u>Direct overall funds:</u> \$10,000; Supplemented ORD-NIEHS and NSF 0509719 awards for 2005 FASEB Summer Research Conference (Snowmass, CO).    |
| 2005      | National Science Foundation, Award No. 0509719 (co-PI with Victoria Bolotina), <u>Title:</u> FASEB Conference: Ion Channel Regulation. <u>Direct overall funds:</u> \$15,000; Supplemented ORD-NIEHS and NIH R13HL082354 awards for 2005 FASEB Summer Research Conference (Snowmass, CO).          |
| 2000-2004 | American Heart Association – Established Investigator Award, 0040238N. <u>Title:</u> Specific residues involved in allosteric interactions of K <sup>+</sup> channel sites with G protein βγ subunits and PIP <sub>2</sub> . <u>Direct Overall Funds:</u> \$300,000.                               |
| 2003-2006 | Fogarty International Center, R03 TW006020. <u>Title:</u> Protein Kinase C-dependent inhibition of Kir channels. <u>Direct Overall Funds:</u> \$96,000.  |
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- 2000-2003 Fogarthy International Center, R03 TW01240. Title: Identification of channel sites in G<sub>βγ</sub> subunits. Direct Overall Funds: \$96,000.
- 1999-2002 National Science Foundation, IBN-9818053. Title: G<sub>βγ</sub> sites for human brain recombinant potassium channels. Direct Overall Funds: \$157,104.
- 2002-2006 National Institutes of Health, National Heart, Lung and Blood Institute, R01HL59949-05-08. Title: Structural determinants of PIP<sub>2</sub> Regulation. Direct overall funds: \$800,000; *Competitive Renewal Awarded.*
- 1997-2001 National Institutes of Health, National Heart, Lung and Blood Institute, R01HL59949-01-04. Title: Lipid Control of G Protein-Gated K<sup>+</sup> Channel Activity. Direct overall funds: \$658,068
- 2005-2006 Mount Sinai School of Medicine - Bridge Funds for HL54185. Title: Distinct G Protein Signaling Pathways Regulate Potassium Channels (Competitive Continuation Proposal with NIH was not funded – A1 revision score: 163, 18.2 percentile; A2 revision score: 168, 22.7 percentile). Direct overall funds: \$225,000.
- 2001-2005 National Institutes of Health, National Heart, Lung and Blood Institute R01HL54185-06-09. Title: Specificity of G<sub>βγ</sub> Signaling. Direct overall funds: \$801,937
- 2000-2006 Mark Pruzansky, MD. Private donor contributing \$5,000-10,000 annually in support of research program.
- 1996-2001 National Institutes of Health, National Heart, Lung and Blood Institute R01HL54185-01-05. Title: Potassium Channel Modulation by G Protein Subunits. Direct overall funds: \$848,255.
- 1995-1998 Life and Health Insurance Medical Research Fund. Title: G-protein Subunit Regulation of an ATP-Sensitive Potassium channel. Direct overall funds: \$75,000.
- 1996-1999 American Heart Association, National Center, Grant-In-Aid. Title: Subunit Interactions of G Protein-Gated Potassium Channels. Direct overall funds: \$120,000.
- 1994-1997 American Heart Association, New York Affiliate, Grant-In-Aid. Title: Identification of G-protein Subunits Involved in K<sup>+</sup> Channel Activation. Direct overall funds: \$128,250.
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1992-1996 National Institutes of Health Research FIRST Award (R29HL46383). Title: Structural Basis of Potassium Channel Function. Direct Overall Funds: \$274,391.

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### **TRAINING GRANTS:**

Member in NIH sponsored Training Grants (VCU):

- (1) Lipid Signaling and Functional Lipidomics in Cardiovascular and Respiratory Diseases (LCRD)

### **RESEARCH ADVISING AND MENTORING:**

#### **Present Post-doctoral Fellows and Associates:**

- 2009 - 1. Shobana Sundaram (PhD, 1994); Instructor  
 2008 - 2. Zhe Zhang (PhD, 2002); Instructor  
 2008 - 3. Qiongyao Tang (PhD, 2004); Assistant Professor  
 2008 - 4. Lia Baki (PhD, 1997); Research Assistant Professor  
 2008 - 5. Edgar Leal-Pinto (PhD, 1964); Adjunct Professor  
 2012- 6. Xuan-Yu Meng (PhD, 2012); Post-doctoral fellow  
 2012- 7. Miao Zhang (PhD, 2007); Assistant Professor

#### **Past Post-doctoral Fellows and Associates:**

- 2010 – 2011 1. Hailong An (PhD, 2005); Post-doctoral fellow; currently: Associate Professor School of Sciences, Hebei University of Technology, Tianjin, China  
 2009 – 2010 2. Wu (Cathy) Deng (PhD, 2009); currently: Research Staff: UCSD  
 2008 - 2010 3. Aldo Rodriguez-Menchaca (PhD, 2008); currently: Assistant Professor at University of San Luis, Mexico  
 2006 - 2008 4. Zhang, Yu-yang (PhD, 2004); currently: Resident at Long Island Jewish Hospital  
 2001 - 2008 5. Rosenhouse-Dantsker, Avia (PhD, 1991); currently: Research Assistant Professor, University of Illinois  
 2003 - 2007 6. Zhao, Qi (PhD, 2003); currently: Law student, Georgetown U.  
 2002 -2006 7. Shen, Albert (PhD, 2000); currently: Research Associate at MSSM  
 2003 -2006 8. Jin, Taihao (PhD, 2003); currently: Postdoctoral Fellow, University of California - San Francisco  
 2000 – 2004 9. Lopes, Coeli (PhD, 1996); currently: Assistant Professor, University of Rochester Medical Center, Rochester, NY  
 1999 – 2002 10. Peng, Luying (PhD, 1997); currently: Postdoctoral Fellow, MSSM, New York, NY  
 1998 – 2005 11. Rohacs, Tibor (PhD, 1997); currently: Assistant Professor, UMDNJ, Newark, NJ  
 1998 – 2001 12. Yan, Xixin (MD, 1988); currently: Chair of



- Pulmonary Medicine, Shijiazhuang, China
- 1997 – 2004 13. Mirshahi, Tooraj (PhD, 1997); currently: Assistant Professor, Weis Research Center Geisinger Clinic, Danville, PA
- 1997 – 2001 14. Zhang, Hailin (PhD, 1995); currently: Professor and Chair of Pharmacology, Hebei Medical University, Shijiazhuang, China
- 1997 – 1999 15. He, Cheng (PhD, 1995); currently: Professor and Chair of Neurobiology, Second Military Medical University, Shanghai, China
- 1997 – 2000 16. Kobrinsky, Evgeny (PhD, 1998); currently: Staff Scientist, NIH, Bethesda, MD
- 1997 – 2000 17. Petit-Jacques, Jerome (PhD, 1992); currently: Postdoctoral Fellow, New York University School of Medicine, New York, NY
- 1996 – 2001 18. Langan, Marie-Noelle (MD, 1984); currently: Clinical Electrophysiologist, Lenox Hill Clinic, New York, NY
- 1993 – 1997 19. Sui, Jin-Liang (MD/PhD, 1993);  
2004 - 2007 currently: Senior Scientist at CombinatoRx, Inc., Cambridge, MA
- 1993 – 1996 20. Chan, Kim (PhD, 1993); currently: Staff Scientist, CV Therapeutics, Inc. Palo Alto, CA
- 1992 – 1993 21. Gross, Gil (MD, 1985); currently: Associate Professor, Hospital for Sick Children, Toronto, Canada

#### **Present Pre-doctoral Students:**

- 2009 - 1. Scott Adney (MD/PhD Candidate); currently: 4<sup>th</sup> PhD year
- 2011 - 2. Candice Hatcher (PhD Candidate); currently: 3<sup>rd</sup> PhD year
- 2011 - 3. Jason Younkin (PhD Candidate); currently: 3<sup>rd</sup> PhD year
- 2012 - 4. Junghoon Ha (MD/PhD Candidate); currently: 1<sup>st</sup> PhD year

#### **Past Pre-doctoral Students:**

- 2006 – 2012 1. Vasileios Petrou (PhD 2012); currently working on publications, searching for postdoctoral lab
- 2008 – 2012 2. Rahul Mahajan (MD/PhD Candidate); defended 10/9/12, currently in M3 year of Medical School. and preparing to defend PhD early October 2012.
- 2007 - 2011 3. Miguel Fribourg (PhD, 2011), currently: postdoctoral fellow with Stuart Sealfon, MSSM, New York, NY
- 2004 - 2010 4. Lupyan, Dmitry (PhD 2010 / co-mentored with

- Dr. Roman Osman); currently: Shroedinger, Inc. MSSM, New York, NY
- 2002 - 2006 5. Keselman, Inna (MD/PhD 2008); currently: Neurology resident, UCLA, CA.
- 2001 - 2006 6. Angelopoulos, Spiros (PhD, 2006 / co-mentored with Dr. Roberto Sanchez); currently: diseased
- 2000 - 2006 7. Rusinova, Radda (PhD, 2006); currently: post-doctoral fellow at Cornell with Olaf Andersen
- 2003 – 2005 8. Woolard-Pickens, Patrisha (PhD, 2005 / co-mentored after David Coleman relocated to McGill); currently: Pediatrics resident, Mount Sinai School of Medicine, New York, NY
- 2000 – 2003 9. Craciun, Liviu (PhD, 2004); currently: Neurology Resident, NIH, MD
- 1999 – 2004 10. Michailidis, Ioannis (PhD, 2004); currently: Postdoctoral Fellow, Columbia University, New York, NY
- 1999 – 2003 11. Jin, Taihao (PhD, 2003); currently: Postdoctoral Fellow, University of California - San Francisco, San Francisco, CA
- 1994 – 1997 12. Kozak, Julius Ashot (PhD, 1998); currently: Assistant Professor, Wright University, OH
- 1990 – 1993 13. Welsh, David (MD/PhD, 1995); currently: Assistant Clinical Professor, University of California, San Diego, CA
- 1990 – 1992 14. Kammen, Bamidele Fayemi (MD, 1994); currently: Radiologist, Oakland, CA

### **Present Masters Students:**

2012 - Chulho Yang

### **Past Masters Students:**

2008-2009 Junghoon Ha (currently MD/PhD student at VCU)  
 2010 – 2011 Gyu Park (VCU MS candidate)

### **Visiting Scientists:**

2012 Linda Boland, Ph.D., Associate Professor, Sabbatical semester, University of Richmond, VA.

2003 Ray Ochs, Ph.D., Visiting Professor, Sabbatical year, St. John's University, Jamaica, New York.

1995-1996 Michel Vivaudou, Ph.D., Visiting Professor, Sabbatical year, CEA, DBMS, Biophysique Moleculaire et Cellulaire (URA CNRS 520), 17 Rue des Martyrs, 38054 Grenoble, France

### **Graduate Student Advisory and Oral Preliminary Examination Committees:**

2011-	1.	Annamarie Carter Dalton (Barton Laboratory, VCU)
2010-	2.	Aaron Randolph (Ramsey Laboratory, VCU)
2006-2012	3.	Justin Costa (Basil Hanss Laboratory, MSSM)
2011-2012	4.	Justin Elenewski (John Hackett Laboratory, VCU)
2009-2011	5.	Crystal West (Shyama Masilamani Laboratory, VCU)
2008-2010	6.	Sherry Pinkstaff (Ross Arena Laboratory, VCU)
2006-2008	7.	Tony Flores (Diverse Laboratory, MSSM)
2004-2007	8.	Tao Ma (Blitzer Laboratory, MSSM)
2004-2008	9.	Elvera Baron (Max/Osman Laboratories, MSSM)
2003-2004	10.	Xiaochu Zhang (First Year Student, MSSM)
2002-2003	11.	Cheryl Tan (Gelb Laboratory, MSSM)
2001-2005	12.	Ailan Lu (Hirsch Laboratory, MSSM)
2001-2004	13.	Eugene Tombler (Diverse Laboratory, MSSM)
2000-2001	14.	Ilona Gurevich (Schmauss Laboratory, MSSM)
2000-2001	15.	Tatyana Gindin (Osman Laboratory, MSSM)
2000-2001	16.	Monica Bhanot (Wang Laboratory, MSSM)
2000-2001	17.	Panayiotis Tsokas (Landau Laboratory, MSSM)
1999-2001	18.	Brian Bloom (Bancroft Laboratory, MSSM)
1998-1999	19.	Maya Srinivas (Forrest Laboratory, MSSM)
1997-2002	20.	Joshua Rappoport (Abramson Laboratory, MSSM)
1997-2001	21.	Montserrat Batle (Hirsch Laboratory, MSSM)
1997-2003	22.	Cristian Perez (Margolskee Laboratory, MSSM)
1997-1998	23.	Peter Morgan (Weiss Laboratory, MSSM)
1996-1998	24.	Avniel Klein (Weiss Laboratory, MSSM)
1996-2001	25.	Michael Ross (Klottman Laboratory, MSSM)
1996-1997	26.	Elizabeth Buck (Iyengar Laboratory, MSSM)
1995-1998	27.	Frank Chuang (Sassaroli Laboratory, MSSM)
1994-1997	28.	Xiaohuai Chen (Bancroft Laboratory, MSSM)
1994-1998	29.	Desiree Pardi (Margiotta Laboratory, MSSM)
1994-1997	30.	Liangxue Zhu (Thornhill Laboratory, MSSM)
1994-1997	31.	Edward Rachofsky (Ross Laboratory, MSSM)
1994-1997	32.	Phil Mulieri (Krauss Laboratory, MSSM)

### **Graduate Student Thesis Examination Committees:**

2012	1.	Justin Costa (Basil Hanss Laboratory, MSSM)
2011	2.	Justin Elenewski (John Hackett Laboratory, VCU)
2010	3.	Sherry Pinkstaff (Ross Arena Laboratory, VCU)
2007	4.	Keri Fogle (Garrett Tibbs Laboratory, Columbia University)
2006	5.	Philip Pian (Steven Siegelbaum Laboratory, Columbia University)
2006	6.	Vishwanatha Jogini (Benoit Roux Laboratory, Cornell University Medical School)
2005	7.	Panayiotis Tsokas (Robert Blitzer/Emmanuel Landau Laboratory, MSSM)
2004	8.	Amit Dhamoon (Jose Jalife Laboratory, Syracuse University)
2004	9.	Christov Roberson (David Clapham Laboratory, Harvard Medical School)
2004	10.	Ailan Lu (Jeanne Hirsch Laboratory, MSSM)
2003	11.	Yi Lee (Jian Yang Laboratory, Columbia University)

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| 2001 | 12. | Montserrat Batle (Jeanne Hirsch Laboratory, MSSM)                |
| 1999 | 13. | Yi Ri (Bargiello Laboratory, Albert Einstein School of Medicine) |
| 1998 | 14. | Desiree Pardi (Joseph Margiotta Laboratory, MSSM)                |
| 1997 | 15. | Makiko Fliss (Carter Bancroft Laboratory, MSSM)                  |
| 1997 | 16. | Andres Couve (Jeanne Hirsch Laboratory, MSSM)                    |
| 1996 | 17. | Jianqiang Chen (Ravi Iyengar laboratory, MSSM)                   |
| 1995 | 18. | Rabin Nouranifar (Emmanuel Landau Laboratory, MSSM)              |

### Laboratory Rotation Students:

- |      |     |  |
|------|-----|--|
| 2012 | 1.  | William Marks (PhD student, first rotation)                                  |
| 2012 | 2.  | Leonid Reshko (MD/PhD student)   |
| 2012 | 3.  | Sarah Kim (MD/PhD student)   |
| 2011 | 4.  | Jason Younkin (PhD Logothetis Laboratory 2011-)                              |
| 2011 | 5.  | Nick Russell (MD/PhD student)  |
| 2010 | 6.  | Candice Hatcher (PhD Logothetis Laboratory 2011-)                            |
| 2009 | 7.  | Charles Anderson (PhD Grider Laboratory 2009-2011)                           |
| 2009 | 8.  | Sayak Bhattacharya (PhD Karnam Laboratory 2010-)                             |
| 2008 | 9.  | Scott Adney (MD/PhD Logothetis Laboratory 2009-)                             |
| 2008 | 10. | Rahul Mahajan (MD/PhD Logothetis Laboratory 2008-)                           |
| 2007 | 11. | Jason Cook (MD/PhD Ramirez laboratory 2009-)                                 |
| 2007 | 12. | Miguel Fribourg (Logothetis Laboratory 2007-2011)                            |
| 2006 | 13. | Vasileios Petrou (Logothetis Laboratory 2006-2012)                           |
| 2006 | 14. | Nikos Tzavaras (Blitzer Laboratory 2006-2012)                                |
| 2004 | 15. | David Carpenter (Tang Laboratory 2005-2010)                                  |
| 2004 | 16. | Paul Rosenstiel (MD/PhD - M. Klotman Laboratory 2005-2009)                   |
| 2004 | 17. | Dmitry Lupyan (Logothetis/Osman laboratories, co-mentorship 2004-2010)       |
| 2004 | 18. | Elvera Baron (MD/PhD - Max Laboratory 2004-08)                               |
| 2003 | 19. | Ioana Carcea (Benson Laboratory 2003-08)                                     |
| 2003 | 20. | Noura Abul-Husn (MD/PhD - Devi Laboratory 2004-07)                           |
| 2003 | 21. | Spiros Angelopoulos (Logothetis/Sanchez laboratories, co-mentorship 2001-07) |
| 2002 | 22. | Inna Keselman (MD/PhD - Logothetis Laboratory 2002-06)                       |
| 2001 | 23. | David Mintz (MD/PhD - Benson Laboratory 2001-05)                             |
| 2001 | 24. | Radda Rusinova (Logothetis Laboratory 2001-06)                               |
| 2000 | 25. | Karishma Manzoor (Zhou Laboratory 1999-04)                                   |
| 1999 | 26. | Maya Srinivas (Forest Laboratory 1999-05)                                    |
| 1999 | 27. | Liviu Craciun (Logothetis Laboratory 1999-03)                                |
| 1999 | 28. | Geo Serban (Robakis Laboratory 1999-05)                                      |
| 1999 | 29. | Panayiotis Tsokas (Landau Laboratory 1999-05)                                |
| 1998 | 30. | Ioannis Michailidis (Logothetis Laboratory 1999-04)                          |
| 1998 | 31. | Edward Rachofsky (MD/PhD - Ross Laboratory 1996-00)                          |
| 1997 | 32. | Kelley Yan (MD/PhD - Zhou Laboratory 1999-04)                                |
| 1997 | 33. | Cristian Perez (Margolskee Laboratory 1998-03)                               |
| 1997 | 34. | Elizabeth Buck (Iyengar Laboratory 1997-01)                                  |
| 1994 | 35. | Smiljka Kitanovic (Sealfon laboratory 1995-99)                               |
| 1993 | 36. | Ashot Kozak (Logothetis Laboratory 1994-97)                                  |

### Summer/Volunteer Students:

- |      |    |  |
|------|----|--|
| 2012 | 1. | Eleftherios Koulierakis (University of Athens, 4 <sup>th</sup> yr Physics) |
|------|----|--|

- |         |     |  |
|---------|-----|--|
| 2012    | 2.  | Thaison Nguyen (VCU, Biology sophomore)  |
| 2012    | 3.  | Zoya Khokar (Eastern Virginia Medical School, M1 student)                                    |
| 2010    | 4.  | Luke Gergoudis (Washington and Lee Univ. Undergrad)  |
| 2010    | 5.  | Brittany Shaw (Mary Baldwin College, STEP-UP Program)  |
| 2010    | 6.  | Gyu Park (VCU, Certificate Program)  |
| 2010    | 7.  | Mohleen Kang (VCU Medical Student, completed 1 <sup>st</sup> year)                           |
| 2009    | 8.  | Kunal Kapoor (VCU Undergrad, HHMI Summer Program)  |
| 2009    | 9.  | Alexandra Hayes (William and Mary, Senior)   |
| 2009    | 10. | Adishesh Narahari (MSIP Summer Intern Program)   |
| 2009    | 11. | Kiara Williams (MSIP Summer Intern Program)  |
| 2007-   | 12. | Stanimir Rachev (Columbia University, SURP)  |
| 2007-   | 13. | Edith Schussler (Mount Sinai School of Medicine, First year Medical Student)                 |
| 2007-   | 14. | Jacqueline Trogan (New York University, Premedical student)                                  |
| 2006-   | 15. | Necrisha Roach (Baruch College, Premedical student)  |
| 1999.   | 16. | Jason Cook (University of Iowa; SURP)  |
| 2005    | 17. | Kirstine Calloe (University of Copenhagen, Panum Institute, Denmark)                         |
| 1998    | 18. | Victor Lukacs (Sommelweis Medical School, Hungary)   |
| 2004-05 | 19. | Ajay Prakash (Columbia University; SURP – MD/PhD student University of Pennsylvania)         |
| 2003    | 20. | Katie Crawford (Summer before freshman year to Swathmore College)                            |
| 2002    | 21. | Marlene Moskowitz (Cornell University, Ithaca ; Summer Undergraduate Research Program -SURP) |
| 2002    | 22. | Jianhong Li (Postdoctoral trainee, Second Medical Military University, Shanghai, China)      |
| 2002    | 23. | Zoltan Molnar (MD/PhD student at Semmelweis University, Budapest, Hungary)                   |
| 2002    | 24. | Matthew Hopperstad (Psychiatry Resident - Mount Sinai School of Medicine)                    |
| 2000    | 25. | Robert Xia (Bronx High School – Massachusetts Institute of Technology)                       |
| 2000    | 26. | Pavan Ramdya (Drew College) – (PhD student, Harvard University)                              |
| 1997    | 27. | Samantha Acunto (Riverdale Country School – Cornell University)                              |
| 1999-00 | 28. | Jason Pruzansky (Dalton High School – Columbia University; Medical School, MSSM)             |
| 1998-99 | 29. | Michael Kalogiannis (Cornell University, Ithaca; NY Medical College- PhD)                    |
| 1995-96 | 30. | Pauline Papavassiliou (Bronx High School – William and Mary College, VCU/MCV-MD/PhD)         |
| 1995-96 | 31. | Peter Rose (University of Texas, Houston – Johns Hopkins School of Medicine)                 |
| 1994-95 | 32. | Mahul Shah (Stuyversant High School – University of Pennsylvania)                            |

### **EXTRAMURAL PRESENTATIONS**

**Local:**

- 2012 (September) VCU, Institute of Structural Biology and Drug Design (Glen Kellog)
- 2011 (April) VCU, Women in Science, Dentistry and Medicine (WISDM),  
Academic career mentoring, Invited Speaker
- 2010 (December 1) VCU School of Medicine, Dept. Pharmacology and Toxicology  
(Hamid Akbarali)
- 2010 (March 9) VCU School of Pharmacy, Graduate Program (Student invitation)
- 2009 (February) VCU School of Medicine, Department of Anatomy and  
Neurobiology (John Povlishock)
- 2008 (September) VCU School of Medicine, Department of Biochemistry (Jessica Bell)
- 2007 (October) City College New York, Department of Biochemistry  
(Thomas Haines)
- 2007 (October) Cornell University - Weill Medical College, Department  
of Physiology and Biophysics (Harel Weinstein)
- 2007 (March) Mount Sinai School of Medicine, Department of Medicine,  
Nephrology Division (Michael Lipkowitz)
- 2006 (October) Bio-Med Society, Student Organization, Baruch College  
(Mary Zhitnikova)
- 2006 (October) Columbia University, Department of Biology, Neurolunch  
series, New York (Jian Yang)
- 2005 (April) Mount Sinai, NY, Office of Postdoctoral Affairs, Panel on  
career advice (Sandra Masur)
- 2004 (July) New York University School of Medicine, Department of  
Cardiology (Bill Coetzee)
- 2004 (February) New York Medical College on Graduate School Education  
(Frances Belloni)
- 2002 (October) Mount Sinai School of Medicine, Dean's Lecture Series, New  
York (Dean's committee)
- 2002 (September) Mount Sinai School of Medicine, Molecular Cell &  
Developmental Biology (Paul Wassarman)
- 2002 (June) S.U.N.Y. Stony Brook, Department of Physiology and  
Biophysics (Suzanne Scarlata)
- 2002 (May) Einstein Medical College, Department of Cardiology (Thomas  
MacDonald)
- 2002 (February) Columbia University School of Medicine, Dept. of  
Pharmacology (Robert Kass)
- 2001 (April) New York University, Washington Square Campus, Dept. of  
Biology (Todd Holmes)

**Regional:**

- 2012 (June) Gordon Research Conference, Phosphorylation and G protein  
mediated signaling networks, U of New England, ME (John Tesmer)

- 2012 (May) Harvard Medical School, Children's Hospital, Boston (Symposium in honor of David Clapham)
- 2012 (January) University of Pennsylvania, Department of Physiology (Toshi Hoshi)
- 2011 (November) New York Structural Biology Center, New York, NY (Wayne Hendrickson)
- 2011 (November) American Society of Nephrology, Protein Lipid Interactions in Cell Physiology, Philadelphia, PA (Jeff Schelling)
- 2011 (November) University of Connecticut, Storrs Campus, Storrs, CT (Anastasios Tsingounis)
- 2011 (October) University of Michigan, Department of Pharmacology, Ann Arbor, MI (Georgios Skiniotis)
- 2011 (April) New York Structural Biology Center, City College, New York, NY (David Stokes)
- 2011 (February) Columbia University Medical Center, Department of Physiology and Cellular Biophysics, New York, NY (Ming Zhou)
- 2011 (January) University of Cincinnati College of Medicine, Department of Pharmacology and Cellular Biophysics, OH (Litsa Kranias)
- 2010 (December) Global Hellenic Medical and Biosciences Network, New York, NY Lenox Hospital, (invited speaker)
- 2010 (April) Washington University, Dept. Anesthesiology, St. Louis, MO (Chris Lingle)
- 2010 (February) Wright State University, Dept. of Neuroscience, Cell Biology and Physiology, Dayton, OH (Ashot Kozak)
- 2009 (October) Hellenic Biosciences Association (Invited Speaker at Multidisciplinary workshop, Boston, MA. (Thomas Thomou)
- 2009 (July) 36<sup>th</sup> International Congress of Physiological Sciences, Speaker on Regular Symposium: Current Advances in G protein and lipid modulation of ion channels, Kyoto, Japan (organizer: Paul Slesinger)
- 2009 (April) ASPET's Division of Molecular Pharmacology, Meeting on G-Protein Targets, Featured Presentation, New Orleans, LA (Alan Smrcka)
- 2008 (December) University of Rochester, Aab Cardiovascular Institute (Coeli Lopes)
- 2008 (April) Experimental Biology Meeting, APS Cell & Molecular Physiology, Featured Presentation, San Diego, CA. (He-Ping Ma)
- 2008 (February) The Biophysical Society, Invited Speaker on subgroup Symposium (Eitan Reuneny)
- 2007 (October) University of Medicine and Dentistry of New Jersey, Department of Physiology (Tibor Rohacs)
- 2007 (May) Solmap Pharmaceuticals, Cambridge, Massachusetts (Frank Guarnieri)
- 2007 (April) University of Oklahoma, Dept. Cell Biology, Biochem. and Molecular Biology (Leonidas Tsiokas)
- 2007 (March) The Biophysical Society, Invited Speaker on Symposium organized by the J. Physiol (Mark Shapiro)

- 2005 (December) McGill University, Montreal Neurological Institute, Canada (Phillippe Sequela)
- 2005 (October) 4<sup>th</sup> Annual Ion Channel Drug Targets, Seattle, WA
- 2005 (June) FASEB Summer Research Conference on "Ion Channel Regulation", Snowmass, CO. (Organizer)
- 2005 (March) Case Western Reserve University, Pharmacology (Toni Scarpa)
- 2004 (December) University of Pennsylvania, Institute for Medicine and Engineering (Irena Levitan)
- 2004 (November) University of Texas, Health Science Center, San Antonio, Dept. of Physiology (Mark Shapiro)
- 2004 (October) University of Medicine and Dentistry at NJ, Dept. Pharmacology and Physiology (Martha Nowicky)
- 2004 (September) Society of General Physiologists, Invited Speaker in Lipid Signaling Symposium (Don Hilgemann)
- 2004 (June) New Jersey Medical School, UMDNJ on Graduate School Education (Nick Ingoglia)
- 2004 (February) Biophysical Society 48<sup>th</sup> Annual Meeting, Invited Symposium Speaker, Baltimore (Don Hilgemann)
- 2004 (January) Case Western Reserve University, Physiology and Biophysics (Kim W. Chan)
- 2003 (December) Oregon Health & Science University, Physiology & Pharmacology (Show-Ling Shyng)
- 2003 (November) American Heart Association, Scientific Sessions 2003 (Awardees Presentations)
- 2003 (October) University of Virginia, Department of Pharmacology (Douglas Bayliss)
- 2003 (October) Jefferson Medical College, Department of Physiology, Institute of Hyperexcitability (Dick Horn)
- 2003 (September) University of Rochester School of Medicine and Dentistry, Physiology (Alan Smrcka)
- 2003 (June) FASEB Conference, Invited Speaker, Tucson (David Armstrong and Sandy Rossie)
- 2003 (January) Keystone Symposia, Invited Speaker in Cardiac Arrhythmias Conference, New Mexico (A. Marks).
- 2002 (October) Weis Center for Research, Penn State College of Medicine, Danville, PA (Catherine Berlot)
- 2002 (April) University of Illinois, Department of Pharmacology (Shigehiro Nakajima)
- 2001 (December) Yale School of Medicine, Department of Physiology, New Haven, CT. (Fred Sigworth)
- 2001 (May) NASPE (Invited Speaker), Boston MA. (Gordon Tomasseli)
- 2001 (April) Medical College of Ohio, Anatomy and Neuroscience, Toledo, OH (Joseph Margiotta)



**International:**

- 2012 (May) World Hellenic Biosciences Association, Summer School, Itilo, Mani (Costas Drosatos)
- 2011 (May) Seventh Aegean Meeting on Neurologic Therapeutics, Heraklion, Crete, Greece (invited speaker, Andreas Plaitakis)
- 2011 (May) Aristotle University of Thessaloniki, Study Group of Medical Justice and Bioethics and Department of Ethics and Sociology, Thessaloniki, Greece (Ioannis Petrou)
- 2011 (May) Aristotle University of Thessaloniki, School of Pharmacy and Department of Biology, Thessaloniki, Greece (Christos Panagiotidis)
- 2011 (May) International School of Biophysics, Erice, Sicily, Italy (invited Speaker – Louis De Felice)
- 2010 (October) University of Crete Medical School, Program of Graduate Studies in the Neurosciences (Andreas Plaitakis)
- 2009 (November) University of Crete Medical School, Dept. Medicine, Division Basic Sciences, Heraklion, Crete, Greece (Dimitris Kardassis)
- 2008 (October) University of Crete School of Medicine, Program in Neurosciences (Andreas Plaitakis)
- 2007 (February) University of Leuven, Department of Pharmacology, Belgium (Mathieu Bollen)
- 2007 (February) University of Freiburg, Department of Physiology, Germany (Bernd Fakler)
- 2006 (September) Institut de Pharmacologie: CNRS, Sophia Anapolis, France (Eric Honore and Michel Lazdunski)
- 2006 (May) University of Leuven, Department of Molecular Cell Biology, Belgium (Bernd Nilius)
- 2006 (May) The Royal Danish Academy of Sciences, Copenhagen, Denmark (Søren-Peter Olesen)
- 2005 (November) International workshop on ionic channels, Colima, Mexico (José Sanchez Chapula)
- 2005 (September) University College London, Pharmacology, UK (David Brown)
- 2005 (September) Ion Channels in Smooth Muscle Conference, University of Oxford, UK (David Beech & Tom Bolton)
- 2003 (March) Neural Signalplexes and Ion Channel Regulation, Okazaki, Aichi, Japan (Keiji Imoto)
- 2002 (September) University of Lyon, Invited speaker in "Ion Channel Conference", France (Michel Vivaudou)
- 2002 (July) University of Thessaloniki, Department of Biochemistry, Greece (Margarita Hadzopoulou-Cladaras)
- 2002 (June) University of Athens, Department of Biology, Athens, Greece (Spiros Efthimiopoulos)
- 2002 (June) University of Crete, Department of Cardiology, Crete, Greece (Panos Vardas)

2002 (March)	Chinese Academy of Science, Institute of Neuroscience, Shanghai, China (Zhuan Zhou)
2002 (March)	Hebei Medical University, Shijiazhuang, China (Hailin Zhang)
2001 (November)	Second Military Medical University, Shanghai, China (Cheng He)
2001 (November)	Hebei Medical University, Shijiazhuang, China (Hailin Zhang)
2001 (August)	Gordon Conference on G proteins (Invited Speaker), Oxford, England (Dafna Bar-Sagi)
2001 (August)	University College, London, Center for Clinical Pharmacology and Therapeutics (Lucie Clapp)
2001 (July)	Second Military Medical University, Shanghai, China (Cheng He)

## **TEACHING, ADVISING AND MENTORING**

### **Teaching experience:**

2010 -	Physiology 512: ECG and Mechanisms of Disease (Course co-director, Lecturer, Spring)
2008 -	Physiology 604: Cell, Molecular and Systems Physiology (Course co-director, Lecturer, Spring)
2008 -	Physiology 691-801: Physiology Research Seminar (Course co-director, Lecturer, Fall)
2008 - 2011	MEDI 117 – Medical Physiology Course (Lecturer, 4 lectures, Spring)
2008 -	Physiology 612 – Cardiovascular Physiology (Lecturer, 2 lectures, Spring)
2008 -	Neurosciences 609: Cellular and Molecular Neuroscience (Lecturer, 7 lectures, Fall)
2009 -	Physiology 620: Ion Channels in Membranes (Lecturer, 5 lectures, Spring)
2009 -	Microbiology 510: Scientific Integrity (Case Facilitator, 10 cases, Fall)
2007 -	Molecular Medicine Masters Program, University of Crete, Greece, (Lecturer, 7.5 hours, Fall)
2005 - 2006	Responsible Conduct in Research (Course Director, Lecturer)
2005- 2006	Methods in the Biomedical Sciences (Course Director)
2004 -	BSBB Core III Course (Lecturer, 2 lectures on Ion Channel Biophysics)
2004 - 2005	Cell Biology – Core II (Lecturer, 5-7 lectures)
2003 - 2005	Medical Physiology Course (Lecturer, 3 lectures on cardiac excitability)
2003 – 2004	Intro to Journal Club (Course Director)
2003 – 2004	Meet the Authors Seminars (Course Director)
2001 – 2004	Principles of Neurobiology I (Lecturer)
2001-2003	Medical Physiology Course (Course Director) A required course for first year medical students covering organ systems (Autonomic Nervous, Cardiovascular, Respiratory,

- Gastrointestinal, Renal, Reproductive and Endocrine). The course involved 106 students, 28 faculty and 7 teaching assistants. New initiatives incorporated: Laboratories in cardiovascular and respiratory physiology, organization of the endocrine block of the course, power point presentations with corresponding handouts for note taking for all lectures, Web based organization of all aspects of the course, including detailed on line evaluations.
- 2001- 2003 Molecules and Cells Course (Lecturer) Seven lectures on Membrane Ion Transport and Cellular Excitability.
- 2000 -2003 Cell Physiology for Medical Students (Component Director) in Molecules & Cells Block.
- 1999-2004 Cell Biology – Core II (Course director) A required course for first year graduate students covering cell membranes and membrane proteins, electrical and chemical signaling via membrane proteins, intracellular compartments, protein sorting and vesicular traffic, cytoplasmic signaling, cytoskeleton, cell-matrix interactions, cell cycle, fertilization, development, differentiation, cancer, apoptosis and immunology, MSSM.
- 1997-1998 Lecturer (Lecture on Membrane Delimited Signaling), Albert Einstein School of Medicine, Neuroscience Course, (Course Director: Thadeus Bargiello).
- 1996-1998 Medical Sciences and Technology Program, Physiology Journal Club, MSSM
- 1995 Course Director of Ion Channels Graduate Level Course, (since 1998 co-directed course with Vladimir Brezina), MSSM
- 1994-2003 Lab Co-director in Cardiovascular Pathophysiology (HST-090), Health Sciences & Technology, MIT and HMS Joint Program.
- 1993- Lecturer and Cardiovascular lab Director, first year physiology course, MSSM.
- 1993-1995 Cardiovascular lab director in Metabolism and Function Course (first year), HMS.
- 1987-1993 Lecturer, Conference leader, Tutorial leader in Metabolism and Function course at HMS
- 1983-1993 Organized and ran Physiology laboratories for first year medical students at HMS; Conference leader in Physiology course.
- 1981-1983 Assisted in preparation and teaching of Physiology laboratories at HMS.
- 1981 Teaching Assistant, Department of Psychology, Northeastern University, introduction to Psychology for undergraduates.

## **SERVICE ACTIVITIES**

### **SERVICE TO THE PROFESSION:**

#### **Grant Reviewer**

- 2009 - National Institutes of Health, NHLBI, Ad Hoc Reviewer for Electrical Signaling, Ion Transport, and Arrhythmias Study Section

2005- 2009	National Institutes of Health/General Medicine (Permanent member – Training Grants BRT-B and BRT-A study sections)
2004	National Institutes of Health/ Biophysics of Synapses, Channels and Transporters (BSCT) Study Section (Ad hoc member)
2000-1998 – 2000	Welcome Trust Foundation, UK National Science Foundation, Neuronal and Glial Mechanisms Ad hoc member)
1993-1994-	Israel Science Foundation Northeast American Heart Association (regular member, Vice Chair in 2002-2004)
1993-	National Institutes of Health/National Heart, Lung and Blood Institute (Ad hoc member)

### Journal Reviewer

#### Editorial Board Member

European Journal of Physiology (Pflugers Archives);  
New journal "Channels"

#### Executive Editor

European Journal of Physiology Special Issue on "*Regulation of Ion Channels by Phosphoinositides*"

#### Reviewer

Nature, Nature Cell Biology, Nature Neuroscience, Cell, Neuron, Molecular Cell, Proceedings of the National Academy of Science (USA), EMBO Journal, Journal of General Physiology, Journal of Physiology (London), Biophysical Journal, Journal of Biological Chemistry, Journal of Neuroscience, Circulation Research, Molecular Pharmacology, PloS1.

#### Consultant

1997 – 2001

CeNeS Pharmaceuticals, Inc.: Advisor on K<sup>+</sup> channel blocker development project

### SERVICE TO THE UNIVERSITY:

2011-2008-2009	Search Committee for Neurosurgery Faculty Chair of Graduate Programs Review Committee – Reviewed all Graduate and Certificate Programs in the School of Medicine and made recommendations for improvements to the Dean.
2009	Associate Director of MD/PhD Program
2009	Search Committee Member for Chair of Internal Medicine
2009	Search Committee Member for Director of the Institute for Structural Biology and Drug Design
2009	Committee on School of Medicine Salary Policy
2008-2009	Steering Committee Member of MD/PhD Program
2006	Oversight Committee for the planning of a Translational Research Building
2005	Task Force charged by the Dean of Research to

	evaluate institutional needs of facilities in existing buildings
2003-2006	Dean's Senior Management Committee
2002-	Ad Hoc Member of Appointments and Promotions Committee
2002-	Member of the selection committee for the Dean's Seminar series
2002-2003	Special Awards and Grants Committee
2001-2003	Member of Executive Curriculum Committee (Medical School)
2001	Education Center Technology Committee
2000-2001	Member of the Graduate Student Recruitment Committee (International Students)
1999-2000	Member of the Advisory Committee to the Peptide Synthesis Core
1999-2000	Member of the Translational Facility Faculty Workgroup
1999-2000	Member of the Evaluation of Teaching for Medical Education
1999-2000	Member of the Year 1 Curriculum 2000 Committee for Medical Education
1999-	Member of the Faculty Disciplinary Tribunal Committee
1999-2003	Elected to Graduate School Executive Committee
1998-2000	Member of Search Committee for Chair of the Molecular Biology and Biochemistry Department
1998	Member of Advisory Committee to the Dean on Neuroscience Program at Mount Sinai
1998	Chair of Anatomy/Embryology/Physiology/Histology Curriculum Subcommittee
1998	Member of Curriculum 2000 Committee for Medical Education
1998-2000	Member of Shared Facilities Committee
1995-	Interviewer for the Biomedical Sciences Doctoral Program
1994-	Graduate School Curriculum Committee
1995-	Interviewer of incoming students for the Medical Sciences and Technology Program
1996-	
1994-2002	Director of Xenopus Oocyte Core Facility

### **SERVICE TO THE DEPARTMENT**

2008 -	Chair of Physiology and Biophysics
2010-2012	Interim Director of Graduate Program in Physiology and Biophysics
2002-2006	Member of Senior Faculty Leadership Committee
2002-2007	Member of Departmental Appointments & Promotions Committee
2002-2004	Chair of Departmental Seminar Committee
1999-2000	Member of Search Committee for Integrative Physiology faculty positions

1998-2001	Ad hoc member of Departmental Appointments & Promotions Committee
1998-1999	Member of Instrumentation Committee
1997-1999	Member of Departmental Seminar and Colloquia Committee
1996-1999	Member of Senior Faculty Committee Advisory to the Chairman
1995-1998	Co-Chairman of Instrumentation Committee
1995-1997	Chair of Departmental Seminar Committee
1993-1995	Member of Departmental Brochure Committee
1993-	Member of Medical Physiology Teaching Committee

## **PUBLICATIONS**

**Journals** (5272 original paper citations as of 11/23/2011); h-index: 33

5559+59(#30)+29(#39)+47(#43)+24(#48)+23(#60)+8(#64)=5749 (total),  
h=32+1(#30)+1(#47)=34, 9/9/12

1. Logothetis DE, Kurachi Y, Galper J, Neer EJ, and Clapham DE. The  $\beta\gamma$  subunits of GTP-binding proteins activate the muscarinic  $K^+$  channel in heart. *Nature* 1987; **325**:321-326 (cited 814 times).
2. Logothetis DE, Kurachi Y, Galper J, Neer EJ, and Clapham DE. G protein opening of  $K^+$  channels (*Scientific Correspondence*). *Nature* 1987; **327**:22 (cited 4 times).
3. Logothetis DE, Kim D, Northup JK, Neer EJ, and Clapham DE. Specificity of the G protein subunits on the cardiac muscarinic  $K^+$  channel. *PNAS* 1988; **85**:5814-5818 (cited 129 times).
4. Clapham DE and Logothetis DE. Delayed rectifier potassium current in embryonic chick heart ventricle. *Am J Physiol* 1988; **254**:H192-H197 (cited 37 times).
5. Plummer MR, Logothetis DE, and Hess P. Elementary Properties and Pharmacological Sensitivities of Calcium Channels in Mammalian Peripheral Neurons. *Neuron* 1989; **4**:1453-1463 (cited 643 times).
6. Koren G, Liman ER, Logothetis DE, Nadal-Ginard B, and Hess P. Gating mechanism of a cloned  $K^+$  channel expressed in frog oocytes and mammalian cells. *Neuron* 1990; **2**:39-51 (cited 78 times).
7. Boulos Z and Logothetis DE. Rats anticipate and discriminate between two daily feeding times. *Physiology & Behavior* 1990; **48**:523-529 (cited 26 times).
8. Logothetis DE, Movahedi S, Satler C, Lindpaintner K, and Nadal-Ginard B. Incremental reductions of positive charge within the S4 region of a voltage-gated  $K^+$  channel result in corresponding decreases in gating charge. *Neuron* 1992; **8**:531-540 (cited 123 times).
9. Logothetis DE, Kammen BF, Lindpaintner K, Bisbas D, and Nadal-Ginard B. Gating charge differences between two voltage-gated  $K^+$  channels are due to the specific charge content of their respective S4 regions. *Neuron* 1993; **10**:1121-1129 (cited 43 times).

10. Castle NA, Fadous S, Logothetis DE, and Wang GK. Aminopyridine block of Kv1.1 potassium channels expressed in mammalian cells and *Xenopus* oocytes. *Mol. Pharmacol.* 1994; **45**:1242-1252 (cited *13 times*).
11. Castle NA, Fadous S, Logothetis DE, and Wang GK. 4-Aminopyridine binding and slow inactivation are mutually exclusive in rat Kv1.1 and Shaker potassium channels. *Mol. Pharmacol.* 1994; **46**:1175-1181 (cited *27 times*).
12. Chen J, DeVivo M, Dingus J, Harry A, Li J, Sui J, Carty D, Blank JL, Exton J, Stoffel, RH, Inglese J, Lefkowitz RJ, Logothetis DE, Hildebrandt JD, and Iyengar R. A region of adenylyl cyclase 2 critical for regulation by G protein  $\beta\gamma$  subunits. *Science* 1995; **268**:1166-1169 (cited *189 times*).
13. Welsh DK, Logothetis DE, Meister M, and Reppert SM. Individual neurons dissociated from rat suprachiasmatic nucleus express independently phased circadian firing rhythms. *Neuron* 1995; **14**:697-706 (cited *681 times*).
14. Chan KW, Langan MN, Sui J, Kozak JA, Pabon A, Ladas JAA, and Logothetis DE. A recombinant inwardly-rectifying potassium channel coupled to GTP-binding proteins. *J. Gen. Physiol.* 1996; **107**:381-397 (cited *57 times*).
15. Sui J-L, Chan KW, and Logothetis DE.  $\text{Na}^+$  activation of the muscarinic  $\text{K}^+$  channel by a G-protein-independent mechanism. *J. Gen. Physiol.* 1996; **108**: 381-391 (cited *80 times*).
16. Chan KW, Sui J, Vivaudou M, and Logothetis DE. Control of channel activity through a unique amino acid residue of a G protein-gated inwardly rectifying  $\text{K}^+$  channel subunit. *PNAS* 1996; **93**: 14193-14198 (cited *62 times*).
17. Chan KW, Sui J-L, Vivaudou M, and Logothetis DE. Specific regions of heteromeric subunits involved in the enhancement of G-protein-gated  $\text{K}^+$  channel activity. *J. Biol. Chem.* 1997; **272**: 6548-6555 (cited *34 times*).
18. Kozak JA and Logothetis DE. A calcium-dependent chloride current in insulin-secreting  $\beta$ -TC3 cells. *Pflügers Arch.* 1997; **433**: 679-690 (cited *14 times*).
19. Vivaudou M, Chan KW, Sui J-L, Jan LY, Reuveny E., and Logothetis DE. Probing the G-protein regulation of GIRK1 and GIRK4, the two subunits of the  $\text{K}_{\text{ACh}}$  channel, using functional homomeric mutants. *J. Biol. Chem.* 1997; **272**:31553-31560 (cited *75 times*).
20. Sui J-L, Petit-Jacques J, and Logothetis DE. Activation of the atrial  $\text{K}_{\text{ACh}}$  channel by the  $\beta\gamma$  subunits of G proteins or intracellular  $\text{Na}^+$  ions depends on the presence of Phosphatidylinositol phosphates. *PNAS* 1998; **95**:1307-1312 (cited *147 times*).
21. Kozak JA, Misler S. and Logothetis DE. Characterization of a  $\text{Ca}^{2+}$ -activated  $\text{K}^+$  current in insulin-secreting  $\beta$ -TC3 cells. *J. Physiol. London* 1998; **509**:355-370 (cited *22 times*).

22. He C, Zhang H, Mirshahi T, and Logothetis DE. Identification of a potassium channel site that interacts with G protein  $\beta\gamma$  subunits to mediate agonist-induced signaling. *J. Biol. Chem.* 1999, **274**: 12517-12524 (cited 67 times).
23. Zhang H, He C, Yan X, Mirshahi T, and Logothetis DE. Activation of inwardly rectifying  $K^+$  channels by distinct  $\text{PtdIns}(4,5)\text{P}_2$  interactions. *Nature Cell Biology* 1999, **1**:183-188 (cited 152 times).
24. Petit-Jacques J, Sui J-L, and Logothetis DE. Synergistic activation of GIRK channels by  $\text{Na}^+$ ,  $\text{Mg}^{2+}$  and  $G_{\beta\gamma}$  subunits. *J. Gen. Physiol.* 1999, **114**:673-684. (Cover) (cited 48 times).
25. Rohács T, Chen J, Prestwich GD, and Logothetis DE. Distinct specificities of inwardly rectifying  $K^+$  channels for phosphoinositides. *J. Biol. Chem.* 1999, **274**:36065-36072 (cited 95 times).
26. Kobrinsky E, Mirshahi T, Zhang H, Jin T, and Logothetis DE. Receptor-mediated hydrolysis of plasma membrane messenger  $\text{PIP}_2$  leads to  $K^+$ -current desensitization. *Nature Cell Biology* 2000, **2**:507-514 (cited 145 times).
27. Pabon A, Chan KW, Sui J-L, Wu X, Logothetis DE, and Thornhill WB. Glycosylation of GIRK1 at Asn 119 and ROMK1 at Asn 117 Has Different Consequences in Potassium Channel Function *J. Biol. Chem.* 2000, **275**: 30677–30682 (cited 14 times).
28. Hughes T, Zhang H, Logothetis DE, and Berlot CH. Visualization of a functional  $G_{\alpha q}$ -green fluorescent protein fusion in living cells: Association with the plasma membrane is disrupted by mutational activation and by elimination of palmitoylation sites, but not by activation mediated by receptors or  $\text{AlF}_4^-$ . *J. Biol. Chem.* 2001, **276**: 4227-4235 (cited 72 times).
29. Zhu L, Wu X, Chan KW, Logothetis DE, and Thornhill WB. Cloning and characterization of G protein-gated  $K^+$  channel (GIRK1) isoforms from heart and brain. *Molecular Neuroscience* 2001, **16**:21-32 (cited 5 times).
30. London B, Guo W, Pan X-h, Lee JS, Shusterman V, Logothetis DA, Nerbonne JM, and Hill JA. Targeted replacement of Kv1.5 in the mouse leads to loss of the 4-Aminopyridine-sensitive component of  $I_{K,slow}$  and resistance to drug-induced QT prolongation. *Circ. Res.* 2001, **88**:940-946 (cited 56 times).
31. Mirshahi T, Robillard L, Zhang H, Hébert TE, and Logothetis DE. Distinct effects of  $G_{\beta\gamma}$  proteins on  $K^+$  channels involve  $G_{\beta}$  residues that do not interact with  $G_{\alpha}$  and underlie agonist-independent channel activity. *J. Biol. Chem.* 2002, **277**: 7348-7355 (cited 26 times).



32. He C, Yan X, Zhang H, Mirshahi T, Jin T, Huang A, and Logothetis DE. Identification of critical residues in the cytoplasmic N- and C-terminal domains of GIRK channels involved in interactions with the  $\beta\gamma$  subunits of G proteins and generation of basal activity. *J. Biol. Chem.* 2002, **277**: 6088-6096 (cited 49 times).
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