Department of Ophthalmology

Presents the

Albert Eye Research Institute
Duke Eye Center

March 28-29, 2014
Sponsored by the Duke University School of Medicine
www.dukeAVS.com
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Course Director
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Associate Professor of Ophthalmology
Chief, Ophthalmology, Durham VA Medical Center
Director, 2014 AVS Course

Guest Faculty
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Atlanta, Georgia

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President Pan-American Retina & Vitreous
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Nagoya, Japan

**Duke Faculty**
Sharon Fekrat, MD, FACS
Associate Professor of Ophthalmology
Chief, Ophthalmology, Durham VA Medical Center
2014, AVS Course Director

Francisco Folgar, MD
Duke Vitreoretinal Fellow

Paul Hahn, MD, PhD
Assistant Professor of Ophthalmology
Vitreoretinal Surgery and Diseases

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Robert Machemer Professor of Ophthalmology
Service Chief, Vitreoretinal Service
Director, Duke Reading Center

Tamer Mahmoud, MD
Associate Professor of Ophthalmology
Vitreoretinal Surgery

Prithvi Mruthyunjaya, MD
Associate Professor of Ophthalmology and Radiation Oncology

Eric A. Postel, MD
Professor of Ophthalmology
Director, Perioperative Services
Vice Chair, Patient Safety

Eric W. Schneider, MD
Duke Vitreoretinal Fellow
Sumit Sharma, MD
Duke Vitreoretinal Fellow

Cynthia Toth, MD
Professor of Ophthalmology and Biomedical Engineering
Director, Biophysics Lab

Lejla M. Vajzovic, MD
Assistant Professor of Ophthalmology

Glenn C. Yiu, MD, PhD
Duke Vitreoretinal Fellow
Commercial Support Acknowledgment
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Alcon Laboratories, Inc.
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Regeneron Pharmaceuticals
Synergetics, Inc.
Thrombogenics, Inc.
Zeiss

Statement of Need
This course is designed for experienced Vitreoretinal Surgeon. Participants will be able to assess new developments in surgical techniques and instrumentation will be presented to stimulate the exchange of ideas. Audience participation will be encouraged and extensive discussion periods will be provided.

Target Audience
Vitreoretinal Surgeons

Learning Objectives
At the conclusion of the activity, attendees should have/be able to:

- Acquired knowledge of the Argus II Retinal Prosthesis System
- Assess various vitreoretinal surgical approaches to eyes with proliferative diabetic retinopathy
- Understand pros and cons of different treatment options for retinal detachment
- Discuss surgical videos and surgical complications
- Recognize treatments for selected pediatric vitreoretinal diseases
- Receive updates on intraocular tumor management
- Assess future directions in treatment and technology for vitreoretinal disease
Accreditation
The Duke University School of Medicine is accredited by the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing medical education for physicians.

Credit Designation
The Duke University School of Medicine is accredited by the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing medical education for physicians. On behalf of the Duke Office of Continuing Medical Education (CME), the 18th Advanced Vitreous Surgery Course has been reviewed and approved as a directly-sponsored activity for up to 12.50 AMA PRA Category 1 Credit(s)™. Each Physician should only claim credit commensurate with the extent of their participation in the activity.

Staff and Content Validation Reviewer Disclosure
The staff involved with this activity and any content validation reviewers of this activity have reported no relevant financial relationships with commercial interests.

Resolution of Conflicts of Interest
In accordance with the ACCME Standards for Commercial Support of CME, the Duke University School of Medicine will implement mechanisms, prior to the planning and implementation of this CME activity, to identify and resolve conflicts of interest for all individuals in a position to control content of this CME activity.

Disclaimer
The information provided at this CME activity is for continuing education purposes only and is not meant to substitute for the independent medical judgment of a healthcare provider relative to diagnostic and treatment options of a specific patient’s medical condition.

Unapproved Use Disclosure
Duke School of Medicine requires CME faculty (speakers) to disclose to the attendees:
1) When products or procedures being discussed are off-label, unlabeled, experimental, and/or investigational (not FDA approved); and
2) Any limitations on the information that is presented, such as data that are preliminary or that represent ongoing research, interim analyses, and/or unsupported opinion.

Faculty at this symposium may discuss information about pharmaceutical agents that is outside of U.S. Food and Drug Administration approved labeling. This information is intended solely for continuing medical education and is not intended to promote off-label use of these medications.

If you have questions, contact the medical affairs department of the manufacturer for the most recent prescribing information.

The following speakers and/or planning committee members have indicated they have no relationship(s) with industry to disclose relative to the content of this CME activity:
G. Hubbard Baker, III, MD
Francisco Folgar, MD
Paul Hahn, MD, PhD
Shunsuke Kubota, MD, PhD
Eric Schneider, MD
Sumit Sharma, MD
Lejla Vajzovic, MD
Glenn Yiu, MD, PhD
Sherif Sheta, MD
The following speakers and/or planning committee members have indicated that they have relationship(s) with industry to disclose:

- Maria Berrocal, MD serves as a speaker and consultant for Alcon Labs. She also receives honorarium from Thrombogenics and holds stock in Hemera.
- Pravin U. Dugel, MD serves as a consultant for Abbott, Alcon Lab., Alimera, Alimera Sciences, Allergan, Arctic DX, An nidis, Acu cela, DigiSight, Genentech, LUX, Macusight, Neovista, ORA, Regeneron, Thrombogenics and holds stock with Alimera, Arctic DX, DigiSight, Macusight, Neovista, Ophthalmot ect.
- Nicole Eter, MD receives honorarium and research support from Novartis, Bayer, and Allergan. Dr. Eter is on an Advisory Board Member for Bausch and Lomb and a speaker for Heidelberg Engineering and Elsevier.
- Sharon Fekrat, MD, serves as a consultant for Prana, speaker for Regeneron, and receives patent royalties from Alcon Laboratories.
- Mark Humayun, MD serves as a consultant for Alcon, Clearside, and Liquidia. Dr. Humayun also is a consultant and holds patents for Bausch and Lomb Surgical, and Iridex. He is also a consultant and equity owner and hold patents for Replenish, Second Sight, RPT and Reflow.
- Raymond Iezzi, MD is on the advisory board for Alcon Surgical and Alimera Sciences.
- Glenn Jaffe, MD is a consultant with Heidelberg Engineering and Neurotech. He also serves on the Advisory Board of Alcon Labs.
- Carlos Mateo, MD is a speaker for Alcon and Zeiss.
- Lawrence Morse, MD is and speaker and Advisory Board Member a for Genentech.
- Prithvi Mruthyunjaya, MD, serves as an Advisory Board Member for Allergan.
- Tamer Mahmoud, MD, PhD, services as a Advisory Board Member for Alimera.
- Hiroko Terasaki, MD is a speaker for Alcon, Bayer, Otsuka Pharmaceuticals. She is also Chairman of Novartis, Pfizer Japan, Santen Pharmaceuticals, Sunju Pharmaceuticals and Wacamoto, CO
- Cynthia Toth, MD, is an associate in a Duke Patent with Alcon Laboratories, is Principal Investigator for Bioptigen, Genentech and Physical Sciences, Inc.
Friday, March 28, 2014
6:45am – S&H Van service will be provided from Washington Duke Inn to Duke Eye Center. Vans will return to Washington Duke on the ½ hour until 10:00am. Attendees requiring transportation after 10:00am, please contact the hotel concierge at 919-490-0999.

7:00am - Van Service will be provided by the Durham Hilton to Duke Eye Center. Van will return to Hilton for second transport 7:30am. Attendees requiring transportation after 7:30am, please contact hotel concierge at 919-564-2900.

Directions to Duke Eye Center are also attached. Parking will be provided for guests who prefer to drive their own vehicle. Please park in the Duke Eye Center Patient Parking Deck.

7:00am  Meeting Registration, Breakfast, Exhibits, and Registration for Chat & Chew Luncheon Discussion Tables and Friday Night AVS Reception At Washington Duke --- Albert Eye Research Institute --- Duke Eye Center

Moderator: Sharon Fekrat, MD

7:40am  Sharon Fekrat  Opening Remarks
7:45am  Pravin Dugel  How to Choose the Correct Gauge: 20g, 23g, 25g, or 27g?
8:00am  Mark Humayun  A Novel Mini Drug Pump for Ophthalmology
8:15am  Tamer Mahmoud  Vitrectomy for PDR: Techniques in the Era of MIVS
8:30am  Prithvi Mruthyunjaya  Prophylactic Scleral Buckles in Fellow Eyes Following RD Repair
8:45am  Raymond Iezzi Jr  Management of Dropped and Dislocated IOLs
9:00am  Lejla Vajzovic  Optic Pit-Related Maculopathy: Diagnosis and Management
9:15am  Hiroko Terasaki  What can be Seen Using Intraoperative OCT?
9:30am  G. Baker Hubbard III  Iris Reconstruction after Trauma
9:45am  Carlos Mateo  Macular Buckling … Meeting the Past

10:00am  Social Break and Refreshments  Visit with the Exhibitors: Interactive Booths with the Latest Toys!
10:30am  Stump the Chump  Surgical Panel Members: Cynthia Toth, G. Baker Hubbard III, Sherif Sheta, Lawrence Morse, Paul Hahn
11:00am  Maria Berrocal  27g Vitrectomy
11:15am  Lawrence Morse  Retinal Detachment Repair in Patients with K-Pro Devices
11:30am  Cynthia Toth  Vitreous Surgery for Pediatric Epiretinal Membranes
11:45am  Nicole Eter  Management of Binocular Perforating Injury Following Explosion Trauma
12:00pm  Glenn Jaffe  Retisert Exchange: Tips and Challenges

12:15pm  *2014 AVS Chat N’ Chew Luncheon Discussion Roundtables

1:30pm  Sherif Sheta  Management of Myopic Macular Holes with Retinal Detachment: Surgical Techniques & Difficulties
1:45pm  Paul Hahn  Perfluorocarbon: Can’t Live with it, Can’t Live Without it
2:00pm  Maria Berrocal  Microincisional Vitrectomy for Giant Retinal Tears
2:15p  Tamer Mahmoud  Subretinal Pneumatic Displacement of SRH: Analysis of Forces
2:30pm  Hiroko Terasaki  Vitrectomy for Retinopathy of Prematurity
2:45pm  G. Baker Hubbard III  Removal of Intraocular Foreign Bodies: Pearls and Pitfalls
3:15pm  Carlos Mateo  Dry Macular Folds: Why, When, and How to Treat Them

3:30pm  Social Break and Refreshments  Visit With the Exhibitors: Interactive Booths with the Latest Toys!

4:00pm  Stump the Chump Surgical Panel  Panel Members: Glenn Jaffe, Raymond Iezzi, Nicole Eter, Pravin Dugel, Lejla Vajzovic, Carlos Mateo

4:30pm  Pravin Dugel  Proportional Reflux Hydrodissection: A New Surgical Technique
4:45pm  Lawrence Morse  Using Retinectomies in Retinal Detachment Repair
5:00pm  Prithvi Mruthyunjaya  Surgical Techniques in Uveal Effusion Syndrome
5:15pm  Sherif Sheta  Myopic Traction Maculopathy (MTM)
5:30pm  Nicole Eter  Temporary Keratoprosthesis for Combined Vitrectomy, Scleral-Sutured IOL, and Keratoplasty
5:45pm  Mark Humayun  Update on Argus II Retinal Prosthesis
6:00pm  Sharon Fekrat  Closing Remarks

6:00pm  Fellow Skit in AERI Auditorium

7:00pm - Meet in the Albert Eye Research lobby for transportation to Washington Duke
S&H Vans will transport all guests to Washington Duke for dinner.
Hilton Van will return guests to Hilton at 9:00pm

7:30pm  Cocktail Reception and Dinner with Peers
         Presidents Ballroom/Terrace at Washington Duke

Saturday, March 29, 2014
6:45am – S&H Van service will be provided from Washington Duke Inn to Duke Eye Center.
Vans will return to Washington Duke on the ½ hour until 10:00am. Attendees requiring transportation after
10:00am, please contact the hotel concierge at 919-490-0999.

7:00am- Van Service will be provided by the Durham Hilton to Duke Eye Center. Van will return to Hilton for
second transport 7:30am. Attendees requiring transportation after 7:30am, please contact hotel concierge at
919-564-2900.

7:00am  Breakfast  Visit With the Exhibitors: Interactive Booths with the Latest Toys!

7:40am  Sharon Fekrat  Opening Remarks
7:45am  Shunsuke Kubota  Role of Sirtuins in AMD
         2013 Robert Machemer Foundation Vitreoretinal Scholarship
8:00am  Carlos Mateo  Viscoelastics in Vitreoretinal Surgery
8:15am  Hiroko Terasaki  Vitrectomy for Myopic Traction Maculopathy
8:30am  Tamer Mahmoud  Closure of Macular Holes: Ocriplasmin vs Vitrectomy
8:45am  Pravin Dugel  Duty Cycle Control: What is it and Does it Matter?
9:00am  Nicole Eter  Subretinal Surgery with RPE Transplantation of Cultured Cells on Rigid Cell Carriers in Rabbits
9:15am  Lawrence Morse  Use of Ocriplasmin for X-linked Foveal Schisis
9:30am  Maria Berrocal  Novel Vitrectomy Techniques for Traction Retinal Detachments (Lift & Peel)
9:45am  Raymond Iezzi Jr  Endoillumination in Vitreoretinal Surgery

10:00am  Social Break and Refreshments  Visit with the Exhibitors: Interactive Booths with the Latest Toys!
10:30am  Stump the Chump Surgical Panel  Panel Members: Maria Berrocal, Prithvi Mruthyunjaya, Mark Humayun, Tamer Mahmoud, Hiroko Terasaki

11:00am  Prithvi Mruthyunjaya  Lessons Learned with Choroidal Biopsy
11:15am  Sherif Sheta  Management of Diabetic Vitreomacular Traction
11:30am  Cynthia Toth  Intraoperative OCT for Vitreoretinal Surgery
11:45am  Tamer Mahmoud  Chandelier Buckles: a New Revolution
12noon  Mark Humayun  A Subretinal Cell Based Implant for Retinal Diseases
12:15 pm  Glenn Jaffe  Encapsulated cell technology for NVAMO
12:30 pm  Raymond Iezzi Jr  Advances in Macular Hole Surgery
12:45 pm  G Baker Hubbard III  Viscodissection for Traction Detachment in PDR
1:00 pm  Sharon Fekrat  2014 Duke AVS CLOSING REMARKS

1:00pm  Van will return guests to Washington Duke and Hilton
For assistance with airport transportation, please see the registration desk.

3:00pm  Post AVS Social  Tamer Mahmoud’s Home (info and sign up at AVS registration desk)

Thank you for coming! Safe travels!
Prithvi Mruthyunjaya | Retinal and Choroidal Biopsy
---|---
Tamer Mahmoud | Subretinal hemorrhage in AMD: You want me to do what with the blood?
Cynthia Toth | Intrasurgical OCT and other emerging technologies: How will it affect surgical decision making?
Paul Hahn | Pars plana vitrectomy: Choosing the right tools for the task at hand
Lejla Vajzovic | The pediatric eye: Tips in managing vitreoretinal cases
Glenn Jaffe | Vitreous biopsy: What do I order and where do I send it?
Lawrence Morse | Optic pit macular detachment: what should I do? Can I laser it instead?
G. Baker Hubbard III | Ocular trauma: Should I ever use that magnet? What if the IOFB is too big?
Mark Humayun | The Argus II: Can I do it or should I just send the patient somewhere?
Sherif Sheta | Should I remove ILM at the time of ERM peel? What should I stain with?
Maria Berrocal | How can I ever survive without the 20g fragmatome and the 20g MPC scissor in the era of small gauge vitrectomy?
Nicole Eter | Temporary keratoprosthesis: tips and tricks
Pravin Dugel | What is the real difference among all of these vitrectomy machines? Does it really matter?
Hiroko Terasaki | When should I use anti-VEGF for ROP? Or should I?
Carlos Mateo | The myopic macula: When should I put on a macular buckle? What do I do?
2014 AVS POSTERS

Berrocal M: Microincisional vitrectomy in complex retinal detachments.


Hahn P: The roles of imaging and ophthalmoscopy in ongoing management of retinal diseases in the current era of high resolution OCT imaging.


Hubbard B: Outcomes of pre-retinal hemorrhage in cases of shaken infant syndrome referred for surgical evaluation.


Schneider E, Todorich B, Kelly M, Mahmoud T: Effect of optical coherence tomography scan pattern and density on the detection of full-thickness macular holes.


Todorich B, DeCroos FC, Khuthaila M, Alshareef R, Lally DR, Fekrat S, Ho AC, Regillo CD and Spirn MJ. Neovascular events in eyes with central retinal vein occlusion (CRVO) undergoing serial bevacizumab or ranibizumab intravitreal therapy: a retrospective study.

