

CURRICULAR VITA

DEMETRIUS KLEE LOPES, M.D.

Date of Birth: March 19, 1970
Citizenship: United States

EDUCATION

Medical School: Federal University of Rio Grande do Sul – UFRGS, M.D.
Porto Alegre, RS Brazil
July 1987 – July 1993

Internship: University of Illinois and Affiliated Hospitals
Chicago, IL
Department of Surgery
July 1993 – June 1994

Residency: Indiana University Medical Center
Indianapolis, Indiana
Neurology, Department of Neurology
July 1994 – June 1995

Residency/Fellowship: State University of New York at Buffalo
Buffalo, New York
Neurosurgery/Endovascular Clinical Fellowship
July 1995 – June 2001

ACADEMIC APPOINTMENTS

Assistant Professor, Department of Neurological Surgery, Rush University Medical Center, Chicago, IL, 2001-present.

Assistant Professor, Department of Radiology, Rush University Medical Center, Chicago, IL, 2001-present.

Voluntary Associate Attending Physician, Department of Surgery, Division of Neurosurgery, Cook County Hospital, Chicago, IL 2001-present.

CERTIFICATION AND LICENSURE

New York State No. 214787
State of Indiana No. 11007066
State of Illinois No. 125-030658
Rio Grande do Sul, Brazil
ECFMG certificate 0-457-005-7

HONORS AND AWARDS

- UFRGS (1987 – 1993) – Teaching Assistant of Human Anatomy and Neurology
- Garcia do Prado Anatomy Award, 1992

SOCIETY MEMBERSHIPS

- American Association Neurological Surgeons - AANS
- Congress of Neurological Surgeons - CNS
- AANS/CNS Cerebrovascular Surgery Joint Section Member
- Society of Neurointerventional Surgery - SNIS
- World Federation of Interventional and Therapeutic Neuroradiology – WFITN

ADDITIONAL EDUCATIONAL TRAINING

- Neuroform stent, December 2002
- Gamma Knife radiosurgery, September 2003
- Carotid Stent Operator Certification for CREST Trial, October 2003
- Onyx embolic material for AVM, June 2005
- Intracranial Stent Wingspan, December 2005
- Intracranial Stent Enterprise, January 2007
- Onyx HD embolic material for Aneurysm, 2007
- Pipeline Flow diverter, 2009

TEACHING

RUSH UNIVERSITY

2009- PRESENT: CEREBROVASCULAR SURGERY LECTURE - NEUROBIOLOGY COURSE
MEDICAL SCHOOL

MENTORSHIP TO STUDENTS/RESIDENTS/FELLOWS

2001-PRESENT: TRAINING NEUROSURGERY, RADIOLOGY AND NEUROLOGY RESIDENTS

2010 – SUMMER RESEARCH ADVISOR RUSH MEDICAL STUDENT– DANIEL HEIFERMAN - PROJECT STENT FOR
BRAIN ANEURYSM

VERTEBROPLASTY COURSE INSTRUCTOR

- Congress of Neurological Surgeons, Boston, MA, 1999
- American Association of Neurological Surgeons, San Francisco, CA, 2000
- Congress of Neurological Surgeons, San Antonio, TX, 2000
- AANS/CNS annual meeting, Section on Pain, Chicago, IL, 2002
- American Association of Neurological Surgeons, San Diego, CA, 2003
- Congress of Neurological Surgeons, Denver, 2003

ENDOVASCULAR COURSE INSTRUCTOR

- Congress of Neurological Surgeons, Seattle, WA, 1998
- Congress of Neurological Surgeons, Boston, MA, 1999
- Congress of Neurological Surgeons, San Antonio, TX, 2000
- Congress of Neurological Surgeons, San Diego, CA, 2000

NEUROFORM STENT COURSE INSTRUCTOR

- Memphis, TN Jul 2004
- Memphis, TN Oct 2004
- Chicago, IL Jul 2005
- Chicago, IL Oct 2005
- Chicago, IL Dec 2005
- Chicago, IL Jan 2006
- Chicago, IL May 2006

NEUROFORM STENT PROCTOR INVITATIONS (TREATMENT OF ANEURYSM)

Columbia Presbyterian Hospital	New York, NY	December 2, 2002
Baylor University Medical Center	Dallas, TX	December 11, 2002
Mayo Clinic	Rochester, MN	December 17, 2002
Alleghany General	Pittsburg, PA	April 8, 2003
St. Luke's Hospital	Kansas City, MO	April 25, 2003
Northwestern Memorial	Chicago, IL	May 28, 2003
Froedtert Memorial Hospital	Milwaukee, WI	June 5, 2003
Northwestern Memorial	Chicago, IL	June 11, 2003
Northwestern Memorial	Chicago, IL	June 18, 2003
Froedtert Memorial Hospital	Milwaukee, WI	August 5, 2003
Froedtert Memorial Hospital	Milwaukee, WI	August 27, 2003
Fletcher Allen Medical Center	Burlington, VT	October 29, 2003
West Virginia University	Morgantown, WV	December 2, 2003
Kaiser Permanente	Redwood City, CA	January 28, 2004
Trillium Health Centre	Mississauga, Ontario	February 16, 2004
Memorial Health	Savannah, GA	March 1, 2004
St. Elizabeth Regional Medical Center	Lincoln, NE	March 15, 2004
Geisinger Medical Center	Danville, PA	April 29, 2004
LeHigh Valley Medical Center	Allentown, PA	May 12, 2004
University of Michigan	Ann Arbor, MI	June 3, 2004
St. Elizabeth Regional Medical Center	Lincoln, NE	September 18, 2004
Sioux Valley Hospital	Sioux Falls, SD	March 23, 2005
Sacred Heart	Eau Claire, WI	November 25, 2005
University of Florida	Gainesville, FL	December 23, 2005
Hospital de Clinicas	Sao Paulo, Brazil	2005
Hospital Base Sao Jose do Rio Preto	Rio Preto, Brazil	2005
Hospital Base Sao Jose do Rio Preto	Rio Preto, Brazil	2005
Hospital Dutra/Hospital Sao Domingos	Sao Luiz, Brazil	2005
Hospital do Coracao	Natal, Brazil	2005
CEDIP	Curitiba, Brazil	2005
Biocor	Belo Horizonte, Brazil	2005
Hospital Lucio Rebelo	Goiania, Brazil	2005
University Tennessee	Knoxville, TN	July 17, 2007

ONYX EMBOLIC MATERIAL PROCTOR INVITATIONS (AVM)

University of Cincinnati	Cincinnati, OH	December 22, 2005
Wayne State University	Detroit, MI	December 2, 2005
Ft Sanders Hospital	Knoxville, TN	March 24, 2006
Ft Sanders Hospital	Knoxville, TN	March 31, 2006
University of Iowa	Iowa City, IA	November 28, 2006
Hinsdale Hospital	Chicago, IL	2006
St Anthony Hospital	St Louis, MO	April 24, 2008
Mayo Clinic	Rochester, MN	August 20, 2008
St Lukes Hospital	Milwaukee, WI	October 23, 2008

ONYX HD EMBOLIC MATERIAL PROCTOR INVITATIONS (ANEURYSMS)

Wayne State University	Detroit, MI	October 22, 2008
Roosevelt Hospital	New York, NY	November 26, 2008
CLEVELAND CLINIC	CLEVELAND, OH	MARCH 3, 2010

WINGSPAN STENT PROCTOR INVITATIONS (ICAD)

University of Arkansas	Little Rock, AK	2007
Bayfront Hospital	Tampa, FL	2007
California Pacific	San Francisco, CA	2009
University of Kansas	Kansas City, MO	2009

CONSULTING POSITIONS

- VaSSol
- Siemens
- Codman
- Stryker
- Covidien
- Penumbra
- Reverse Medical

COMMITTEE AND ADMINISTRATIVE SERVICES

- Director Cerebrovascular Neurosurgery RUSH University

- Co-Director RUSH University Stroke Center
- Vice Chair Interventional Services Executive Committee RUSH University ISEC
- Chair of RUSH Knowledge Transfer Committee
- Member of RUSH/Siemens Partnership Steering Committee
- Member Operation Stroke Medical/EMS Subcommittee
- Member of RUSH OR value analysis Committee

SCIENTIFIC AND SCHOLARLY ACTIVITIES

REVIEWER FOR PROFESSIONAL JOURNALS

NEUROSURGERY

JOURNAL OF STROKE & CEREBROVASCULAR DISEASES

PATENTS

Patent filed 25-Jun-02

Method of navigating medical devices in the presence of radiopaque material
(Magnetic navigation with “GPS” sensor)

INVITED PRESENTATIONS/SEMINARS/LECTURES AT REGIONAL, NATIONAL, AND INTERNATIONAL MEETINGS

2011

A.) AANS/CNS CEREBROVASCULAR SECTION, LOS ANGELES, CA

- ENDOVASCULAR STRATEGIES FOR THE MANAGEMENT OF ACUTE STROKE

2010

A.) Society of Neurointerventional Surgery meeting, Carlsbad, CA

- A Novel Micro-catheter based stent device for the treatment of acute ischemic stroke
- Neuroform EZ and transfer technique experience

B.) AANS meeting breakfast seminar, Philadelphia, PA

- Coil vs. Clip for intracranial aneurysms

C.) ESMINT meeting, Nice, France

- **Stent and coil technique for cerebral aneurysms**
- D.) RUSH Internal Medicine Grand Rounds, Chicago, IL**
- **Sammpris trial**
- E.) XXXIX Brazilian Radiology Congress, Rio de Janeiro, Brazil**
- **Acute Stroke Center: Role of Endovascular**
 - **Embocure of AVMs**
 - **Stent and coil technique**
- F.) Curso de Doencas Cerebrovasculares, Rio de Janeiro, Brazil**
- **Update on treatment of AVM**
 - **Acute Stroke Centers**
 - **Stenting in cases of SAH**
- G.) SILAN/SIMI, Buenos Aires, Argentina**
- **Management of intracranial stenosis**
 - **Management of complex aneurysms**
- H.) SNIS Practicum, Boston, MA**
- **The transfer technique for Neuroform stent**
- I.) Colombian Society of Neurosurgery Cerebrovascular Meeting, Cartagena, Colombia**
- **The role of Embocure for AVMs**
 - **Eight year experience with stent and coil technique**
- J.) LINCC meeting, Istanbul, Turkey**
- **Eight year experience with self expanding stents for the treatment of cerebral aneurysms**

2009

- A.) Acute Stroke and Cerebrovascular Interventions, St Louis, MO**

- **Mechanical thrombolysis for acute stroke**
 - **AVM embolization as a primary treatment modality**
- B.) SOBRICE meeting, Sao Paulo, Brazil**
- **Stent and coil experience with cerebral aneurysms**
 - **Flow divertors initial experience**
 - **Treatment of intracranial atherosclerosis**
- C.) Cerebral Revascularization, New York, NY**
- **Endovascular treatment of ischemic disease**
- D.) Acute Stroke and Cerebrovascular Interventions course, Saint Louis, MO**
- **Mechanical Thrombolysis in acute stroke**
 - **Embolization as primary therapy for cerebral AVM**
- E.) SIMI meeting, Buenos Aires, Argentina**
- **Y technique current indications and limitations**
 - **“The Final Word: When to Use Stents, When is Coiling Enough and, When Would Flow-Diverters be a Better Choice”**

2008

- A.) American Society of Neurophysiological Monitoring**
- **Lessons learned in endovascular neurosurgery and neuromonitoring**
- B.) Congress of Neurological Surgeons , Orlando, FL**
- **Advanced aneurysm stenting techniques**
- C.) LINCC meeting, Paris, France**
- **USA experience with Onyx embolization of cerebral AVMs**
- D.) Intracranial Stent Meeting, Ankara, Turkey**
- **Long-term results with Y stent technique**
 - **Use of stents in Acute Stroke**
 - **Use of stents in distal aneurysm repair**
 - **Stent as flow diverter on the treatment of aneurysms**

E.) LINC meeting, Houston, TX

- Stent Transfer Technique

F.) EV3 Sales Meeting, Laguna Beach, CA

- AVM treatment with ONYX
- Aneurysm coiling

G.) RUSH ENT Department Grand Rounds, Chicago, IL

- Tumor embolizations

H.) Chicago Physical Rehabilitation Medicine Residents course, Chicago, IL

- Treatment of cerebrovascular disease

I.) AANS/CNS Cerebrovascular Section Meeting, New Orleans, LO

- **Intracranial Stenting of Aneurysms: Technical Design, Clinical considerations and Tradeoffs**

2007

A.) X SOBRICE, Sao Paulo, Brazil

- DynaCT in neurointervention

B.) XII Congresso da Academia Brasileira de Neurocirurgia, Brasilia, Brazil

- Treatment of ICAD

C.) VII Simposio Anual do Servico de Neurocirurgia do H MV, Porto Alegre, Brazil

- **Intracranial stents on the treatment of cerebrovascular disease**
- **Treatment of AVM's**

D.) III Simposio Neurovascular Internacional, Rio de Janeiro, Brazil

- Multimodality treatment of AVM's
- Acute Stroke treatment – Endovascular techniques

E.) TCT, Washington, DC

- Residual stenosis following carotid artery stent placement is associated with higher incidence of in-stent stenosis

F.) ASITN Praticum, Dana Point, CA

- Initial experience with self-expanding stents on the management of ICAD

G.) ASNR, Chicago, IL

- Efficacy of contrast enhanced MRA for NOVA as means to visualize intracranial arteries with endoprotheses
- Contrast enhanced MRA as a means to visualize blood flow through intracranial vascular endoprotheses

H.) Annual Scientific Congress, Christchurch, New Zealand

- The endovascular neurosurgeon
- Meet the Master Seminar – The endovascular surgeon
- Carotid endarterectomy and stenting

I.) American Association of Neurological Surgeons, Washington, DC

- Long-term experience with self expanding stents on the management of wide neck cerebral aneurysms
- Initial experience with self-expanding stents on the management of intracranial atherosclerosis
- Multimodality treatment of cerebral AVM: Hybrid training

J.) Neuroradiological Endovascular Symposium (NRES), Bahia, Brazil

- Long-term results on the use of stents for the management of cerebral aneurysms

K.) Grand Rounds Saint Anthony Hospital, Crown Point, IN

- Carotid Stenting Update

L.) The Society for Cardiovascular Angiography and Interventions, Orlando, FL

- Impact of Stent Type on Carotid Duplex Ultrasonography Derived Flow Velocities – Evaluation of 3 Stents in an In-vitro Model

M.) International Stroke Conference, San Francisco, CA

- Risk of Retreatment and Surveillance of Coiled Intracranial Aneurysms
- Initial experience with antiplatelet monitoring during interventional procedures
- The Penumbra Stroke Trial: A Phase 2 study to assess safety and performance of a new generation mechanical device for clot removal in acute stroke

2006

A.) Neurology Grand Rounds University of Chicago, Chicago, IL

- Treatment of intracranial atherosclerosis

B.) OCIN Congress, Shanghai, China

- The role of the endovascular neurosurgeon on the management of cerebrovascular disease
- Long term experience with Neuroform stent on the management of cerebral aneurysms
- Initial experience with Wingspan stent on the management of intracranial atherosclerosis

C.) IX SOBRICE, Sao Paulo, Brasil

- Treatment of carotid stenosis
- Update on treatment of acute stroke
- Treatment of intracranial atherosclerosis with Wingspan stent

D.) VII Congresso da Sociedade Brasileira de Neuroradiologia, Curitiba, Brazil

- Neuroform experience on the management of cerebral aneurysms

E.) ESNR/ 3rd Intracranial stent meeting, Geneva, Switzerland

- The use of neuroform stents on the treatment of wide neck ACA aneurysms
- Early experience with Wingspan stent on the management of intracranial atherosclerosis

- Long-term anatomical results of aneurysms treated with remodeling vascular devices (Neuroform)

F.) Congress of Neurological Surgeons, Chicago, IL

- The use of neuroform stents on the treatment of wide neck MCA aneurysms

G.) Midwest Stroke and Neurovascular Symposium, Wisconsin Dells, WI

- Endovascular treatment of intracranial atherosclerosis

H.) II Congresso Cearense de Neurologia e Neurocirurgia, Fortaleza, Brazil

- Treatment of cerebral aneurysms
- Stroke Center: How we do it
- Treatment of arteriovenous malformations

I.) BSC Global Sales Meeting, Colorado Springs, CO

- Remodeling Vascular Devices

J.) Ev3 National Sales Meeting Lake Tahoe, CA

- Treatment of Arteriovenous Malformations

K.) Grand Rounds at the Rehabilitation Institute of Chicago

- Update in the treatment of neurovascular disease

L.) Rush University Neuroscience Institute Leadership Committee, Chicago, IL

- The future of Global Revascularization

M.) RUSH university Heart and Vascular Leadership Committee, Chicago, IL

- Global Revascularization at RUSH

N.) ASNR – American Society of Neuroradiology Meeting, San Diego, CA

- The impact of remodeling vascular devices on the treatment of cerebral aneurysms- Part 1

O.) 4th Annual ASITN Practicum San Diego, CA

- The impact of remodeling vascular devices on the treatment of cerebral aneurysms - Part 2
- The initial USA experience with ONYX prolonged intranidal embolization of AVM's

P.) Neurosurgery Grand Rounds University of Chicago, Chicago, IL

- The impact of endovascular treatment on Cerebrovascular Neurosurgery

Q.) SILAN, San Juan, PR

- The endovascular treatment of intracranial atherosclerosis

2005

A.) II ASITN Annual course workshop, Oahu, HI

- The use of stents on the treatment of cerebral aneurysms

B.) 2nd ICS – Intracranial Stent Meeting Buenos Aires, Argentina

- Durability of stent and coil technique

C.) American Association Neurological Surgeons, New Orleans, LA

- Stroke Center: Strategies for developing an effective program in your practice
- Management of ruptured wide neck aneurysms with staged intracranial stent and coil technique

D.) BRAIN presentation, Fremont, CA

- Cerebral Vascular Disease Processes & Treatment Options

E.) SILAN Meeting, Lima, Peru

- Matrix and Neuroform Workshop
- Experience with Neuroform 3

F.) Congresso Gacho de Neurologia e Neurocirurgia, Bento Goncalves, Brazil

- Treatment of aneurysms after ISAT
- Treatment of arteriovenous malformations

G.) Cordis IberoAmerican Advisory Board, Rio de Janeiro, Brazil

- Intracranial stenting

H.) Grand Rounds Instituto BIOCOR, Belo Horizonte, Brazil

- Treatment of intracranial aneurysms with stent and coil technique

I.) AANS/CNS/ASITN CV Section

- Hydrocoil experience on the treatment of aneurysms
- Durability of intracranial stents

J.) Congress of Neurological Surgeons, Boston, MA

- Complication rate associated with flexible Neuroform stents in the endovascular treatment of intracranial aneurysms
- Long-term follow-up of quality of life after gamma knife radiosurgery for arteriovenous malformations.
- Early experience with Hydrocoil™ expandable coils in treatment of intracranial aneurysms
- Fluoroscopy time and contrast load delivered during neuro-endovascular procedures.

K.) 7th International Stereotactic Radiosurgery Society Meeting Brussels, Belgium

- Long-term follow-up of quality of life after gamma knife radiosurgery treatment of arteriovenous malformations
- Follow-up to cure of intracranial arteriovenous malformations after gamma knife radiosurgery
- Long-term follow-up of quality of life after gamma knife radiosurgery treatment of arteriovenous malformations

L.) European Neuroradiology Society Meeting Barcelona, Spain

- The use of stents for treatment of wide neck aneurysms

2004

A.) ABC/WIN Meeting Val D'Isere, France

- Magnetic Neuronavigation: A Safety Study

B.) 1st ICS - International Intracranial Stent Meeting, Geneva, Switzerland

- Endovascular Bypass: Clinical Series

C.) NBC Channel 5 Expo, Chicago, IL

- Stroke - Symptoms, Signs and the Latest in Prevention and Treatment

D.) Preventive Medicine Grand Rounds Rush University Chicago, IL

- Advances in Acute Stroke Intervention

E.) MicroVention Worldwide Sales Meeting, Dana Point, CA

- Clinical Application of HydroCoil

F.) Neurosurgical Forum Ponte Verda, FL

- Endovascular and Neurovascular Surgery: Bringing it all Together

G.) American Association of Neurological Surgeons, Orlando, FL

- Discussant: Analysis of Morphologic Factors of Arteriovenous Malformations Predictive of Pre-treatment of Post-Treatment Hemorrhage or Radiological Success after Radiosurgery
- Moderator: Stroke Centers: Strategies for Developing an Effective Program for your Practice
- Author: Initial Clinical Experience with Magnetic Navigation System: A safety study

H.) Matrix & Neuroform Training London Ontario Canada

- Lecture on Matrix clinical experience
- Animal Lab Training

I.) Rush North Shore Grand Rounds, Skokie, IL

- Criteria for the Use of Intracranial TPA and Stroke Plus Transfer Protocol

J.) BSC Midwest Area Sales, Vail, CO

- Neuroform Stent Experience

K.) Grand Rounds Dr. Robert Havey's Clinical Practice, Chicago, IL

- Update on New Treatments and Trials in the Endovascular World

L.) XXV Congresso Brasileiro de Neurocirurgia Goiania, Goias Brazil

- How to Combine Neurosurgical and Endovascular Techniques in Handling Intracranial Aneurysms
- Magnetic Neurosurgery: How to Use an External Magnetic Field to Guide Endovascular Instruments

M.) 12th Interventional Fellows Symposium San Francisco, CA

- Building your Business out of Fellowship; the Do's and Don'ts

N.) Advanced Endovascular Techniques Symposium, Chicago, IL

- Neuroform Stent Experience

O.) Matrix & Neuroform Training, Sao Paulo, Brazil

- Lecture on Matrix clinical experience
- Animal Lab Training

2003

A.) 10th Congress of the Academy of Brazilian Neurosurgeons, Recife, Brazil

- The International Subarachnoid Aneurysm Trial: A Neurosurgical Perspective

B.) 7th Congress of World Federation of Interventional and Therapeutic Neuroradiology, Recife, Brazil

- Matrix Coil Experience for aneurysms

C.) Congress Neurological Surgeons, Denver

- Kyphoplasty and Vertebroplasty: Indications, Techniques and Outcomes

- Endovascular Neurosurgery for Residents
- Poster Presentation: Continuous Intravenous Magnesium Sulfate in Patients with Subarachnoid Hemorrhage: *A Retrospective Analysis*

D.) Annual Clinical Assembly of Osteopathic Specialists Meeting, Chicago, IL

- Endovascular vs Surgical Treatment of Aneurysms

E.) American Association of Neurological Surgeons, San Diego, CA

- Endovascular Strategies for Carotid Disease
- Vertebroplasty Course: Indications and Treatment Options
- Stroke Centers: Strategies for Developing an Effective Program for Your Practice
- Poster Presentation: Magnetic Navigation

F.) AANS/CNS/ASITN CV section, Phoenix, AZ

- Endovascular Bypass: Initial Clinical Experience

G.) Grand Rounds Ingalls Hospital, Chicago, IL

- Advances in Acute Stroke Intervention
- Cerebrovascular Center Webcast

H.) Boston Scientific National Sales Meeting, San Francisco, CA

- Clinical experience with Synchro Guidewires

2002

A.) AANS/CNS/ASITN CV SECTION, DALLAS, TX

- Double-Stent Technique for the Management of Cerebrovascular Disease
- Hemodynamic Changes in Stented Fusiform Basilar Aneurysms: Clinical Experience

B.) XIX Congresso Brasileiro de Neurocirurgia, Fortaleza, CE, Brazil

- Vertebroplastia Percutânea com PMMA: Uma Opção Terapêutica para Pacientes Portadores de Fratura Vertebral por Osteoporose

- Complicações Vasculares Associadas a Cirurgia da Coluna Vertebral
- Vertebroplastia Percutânea com PMMA: Descrição Técnica e Indicações

C.) Boston Scientific Sales Meeting, Chicago, IL

- Neuroform Stent Review

**D.) Neurology and Neurosurgery Grand Rounds Hospital Moinhos de Vento
Porto Alegre, Brazil**

- Building a Stroke Center

2001

A.) AANS/CNS/ASITN CV section, Big Island, HI

- Intra arterial recombinant tissue plasminogen activator for Ischemic stroke: An accelerating dosing regimen.
- Current limitations to intracranial stent deployment.
- A new grading system to evaluate intra-arterial occlusion response to thrombolytics in patients with acute ischemic stroke.
- Patency of arterial branches crossed by intracranial stents: The fate of the “jailed” artery.

B.) Congress of Neurological Surgeons, San Diego, CA

- Coil migration after balloon neck remodeling of superior cerebellar artery aneurysm requiring stent placement.
- Comparison of anesthetic techniques in acute stroke intraarterial thrombolysis.
- Neurolite SPECT scanning aids selection of patients with acute cerebral ischemia for prolonged hypertensive therapy with midodrine.
- Neurolite SPECT scanning to select patients for brachiocephalic or carotid revascularization before coronary artery bypass grafting (CABG).
- Safety and diagnostic cerebral angiography in an endovascular neurosurgery fellowship training program.

- Initial experience with aneurysm embolization using thermally detachable microcoils.

C.) The American Heart Association - Operation Stroke Chicago, IL

- “New Techniques in Interventional Therapies”

D.) Department of Neurology Grand Rounds Rush University, Chicago, IL

- “Endovascular Revascularization”

2000

A.) Congress of Neurological Surgeons, San Antonio, TX

- Post-procedural hemodynamic instability after carotid artery angioplasty and stenting.

1999

A.) American Society Neuroradiology, San Diego, CA

- The effect of glacial acetic acid on the kinetics of n-Butyl-2-Cyanoacrylate embolization in a chronic swine arteriovenous malformation model.
- Carotid artery stenting improves cerebral perfusion.
- In vitro measurements of physiologic pressures via microcatheters for endovascular application.
- Intravascular stents for endoluminal cerebrovascular bypass.

B.) American Association of Neurological Surgeons, New Orleans, LA

- Percutaneous transluminal angioplasty and stent placement for recurrent carotid artery stenosis.

C.) Congress of Neurological Surgeons, Boston, MA

- Intravascular stents for endoluminal cerebrovascular bypass.

D.) ASME/AIChE/ASCE/BMES Summer Bioengineering Conference, Big Sky, MT

- Kinetics of embolization in a chronic model of arteriovenous malformation in the swine.

1998

A.) Congress of Neurological Surgeons, Seattle, WA

- Carotid angioplasty and stenting prior to coronary artery bypass grafting.
- Carotid artery angioplasty and use of stents in high-risk patients with contralateral occlusions.
- A clinical grading scale for predicting outcomes after contrast extravasation during thrombolysis for acute stroke.
- Mechanical revascularization of cerebral arterial occlusions for acute thromboembolic stroke.

B.) American Association of Neurological Surgeons, Philadelphia, PA

- Improved venous glue embolization of complex dural arteriovenous malformations with endovascular outflow tract obstruction technique.
- Salvage intra-arterial thrombolysis for thromboembolic endovascular complications.

1997

A.) Congress of Neurological Surgeons, New Orleans, LA

- Massive aneurysm regrowth delayed two years after successful Guglielmi detachable coil treatment: Case report.
- Focal extracellular contrast accumulation after intraarterial thrombolysis for acute ischemic stroke.
- Endovascular measurement of physiologic pressure gradients in carotid artery stenosis.
- Cavernous sinus syndrome during balloon test occlusion of the carotid artery stenosis.

- Flow quantification in AVMs using Ethiodol droplets for NBCA embolization.
- Endovascular treatment of wide-necked cerebral aneurysms using temporary balloon protection and GDC.
- Grisel's syndrome presenting with C3-4 subluxation.

1994

A.) Congress of Neurological Surgeons, Chicago, IL

- Anterior surgical approach to the cervical spine for disc disease: Sternal vs. Iliac graft.

1992

A.) XIX Congresso Brasileiro de Neurocirurgia, Sao Paulo, SP, Brazil

- Compression of the tenth thoracic nerve root by a facet joint synovial cyst: case report.

B.) 12th Semana Cientifica do HCPA, Porto Alegre, RS, Brazil

- Neuronal transplants: a new therapeutic strategy for CNS diseases.
- Neuronal transplants: a new perspective.

1991

A.) 12th Congresso Brasileiro de Eletroencefalografia e Neurofisiologia Clinica, Gramado, RS, Brazil

- Characteristics of a newborn population presenting encoches frontales in polygraphic studies during the neonatal period.

B.) 11th Semana Cientifica do HCPA, Porto Alegre, RS, Brazil

- Microsurgical study of the pre-central, central and post-central arteries of the human cortex.
- Comparacao de metodos neuroradiologicos e neurofisiologicos na deteccao de patologias neonatals.

- AIDS related toxoplasmosis encephalitis: prevalence, serology, tomographic and anatomoclinical correlation.
- Atypical clinical presentation of Kawasaki disease: Case Report.

FUNDING HISTORY OF GRANTS

- 2004 – CINN Foundation \$40,000
- 2005 – Boston Scientific Research Grant \$25,000
- 2005 – CINN Foundation \$40,000
- 2007 – CINN Foundation \$35,000
- 2007 – Boston Scientific Research Grant \$15,000
- 2007 – CINN Foundation \$ 15,000
- 2008 – CINN Foundation \$ 15,000
- 2009 – Covidien Research Grant \$ 50,000
- 2011 – Covidien Research Grant \$ 50,000 (pending approval)
- 2011 – Stryker Research Grant \$ 50,000 (pending approval)

RESEARCH

Local Principal Investigator – Covidien

SWIFT trial Prospective randomized solitaire stent vs Merci retriever on the treatment of acute stroke

Local Principal Investigator - Chestnut

PUFFS trial- Prospective non randomized study using a flow divertor Pipeline for anterior circulation wide neck aneurysms

Local Principal Investigator – Boston Scientific Corporation

MAPS Study : A Prospective, Randomized, Multicenter Trial Investigating Matrix^{2™} and GDC[®] Coils for the Treatment of Intracranial Saccular Aneurysms

Local Principal Investigator – Cordis

SAPPHIRE World-Wide Post-Market Trial: Stenting and Angioplasty With Protection in Patients at High-Risk for Endarterectomy

Local Principal Investigator – Penumbra

Evaluation of the Penumbra Stroke System™ in the Revascularization of Patients with Acute Ischemic Stroke Secondary to Intracranial Large Vessel Occlusive Disease

Principal Investigator – Stereotaxis

A Clinical Study to Evaluate the Safety and Efficacy of the *Telstar Magnetic Navigation System* for Endovascular Navigation

Local Principal Investigator – Seacoast Technologies

A Safety Study of the ChillerStrip™ System and Pump Chiller Unit (PCU) and Direct Brain-Surface Application of the ChillerStrip in Adult Patients Undergoing Elective Surgical Repair of an Intact Cerebral Aneurysm

Local Principal Investigator – Boston Scientific Corporation

BEACH Trial - Boston Scientific EPI: A Carotid Stenting Trial for High Risk Surgical Patients

Local Principal Investigator – W.L. Gore & Associates, Inc.

MAGELAN Trial - A Prospective, Multicenter, Feasibility Trial to Evaluate the Safety and Performance of GORE Embolic Liquid Used in Presurgical Embolization of Cerebral Arteriovenous Malformation

Local Principal Investigator – Boston Scientific Corporation

MAPS Study : A Prospective, Randomized, Multicenter Trial Investigating Matrix²™ and GDC® Coils for the Treatment of Intracranial Saccular Aneurysms

Co-Investigator - NIH

SAMMPRIS trial: Prospective Randomized stent vs medical therapy for the treatment of intracranial atherosclerosis

Co-Investigator – Abbott Laboratories

SECURE Trial - A Registry Study to Evaluate the Neuroshield™ Bare Wire Cerebral Protection System and X.act™ Stent in Patients at High Risk for Carotid Endarterectomy

Co-Investigator – Confluent Surgical, Inc.

A Multi-Center Study to Evaluate The DuraSeal Dural Sealant System as an Adjunct to Sutured Dural Repair During Cranial Surgery

Co-Investigator – National Institutes of Health (NIH)

CREST Trial : Carotid Revascularization Endarterectomy versus Stenting Trial

Co-Investigator – Confluent Surgical

A Prospective, Multi-Center, Randomized Controlled Study to Compare the Spinal Sealant System as an Adjunct to Sutured Dural Repair to Standard of Care Methods during Spinal Surgery

Humanitarian Use Device: Enterprise™ Vascular Reconstruction Device – Codman

Humanitarian Use Device: Neuroform™ Microdelivery Stent –Stryker

Humanitarian Use Device: Wingspan™ Microdelivery Stent –Stryker

PRE-CLINICAL STUDIES

In Vivo Evaluation of GDC®V (Guglielme Detachable Coil) in animal aneurysm model

Intracranial vascular access in human cadaver model

BIBLIOGRAPHY

ORIGINAL FULL-LENGTH MANUSCRIPTS

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