

BS, Zoology.

LICENSURE

- Medical license, Board of Medicine, State of Florida.
- Medical license, Board of Medicine, State of Michigan.

CERTIFICATION

- Cervical Arthroplasty: Core Education Course, September 2007.
- X-Stop device for lumbar stenosis training program, February 2006.
- Charite' Artificial Disc comprehensive training program, May 2005.
- Dynesys Dynamic Stabilization Workshop, May 2005.
- Kyphon Inflatable Bone Tamp Technology. July 2004.
- Challenges to spine surgery. Las Vegas, Nevada. April. 2003.
- Surgical Approaches to the Skull Base at the Anspach Effort, Inc. Nov. 2002.
- Advanced Spine Preceptor at the Spine-Tech Division Center of Excellence, St. John's Health center, Oct. 2002.

PROFESSIONAL AFFILIATION

- American Association of Neurological Surgeons, member
- AANS/CNS Section on Tumors, member
- Congress of Neurological Surgeons, member
- Palm Beach County Medical Society, member

HONORS AND SCHOLARSHIPS

- Award for Excellence in Scholarly Activity, Wayne State University, July 1999.
- Academic Honors Scholarship, 1991. University of Maryland.
- Academic Honors, 1990 and 1991. University of Maryland.

RESEARCH EXPERIENCE AND PROJECTS

1997-1999:

Neurological Surgery Lab., Department of Neurological Surgery, Wayne State University

Doctoral dissertation research on the effects of infantile hydrocephalus and its early and late treatments on the GnRH (gonadotropin hormone-releasing hormone) system in rats. This research utilized a number of microsurgical and basic science techniques such as survival operations for cerebrospinal fluid diversion devices (Ventriculo-subcutaneous shunts), immunohistochemistry, radioimmunoassay and Western blot analysis. In addition, methods for protein isolation and purification and basic histology studies were

utilized.

1992-1996:

Neuro-oncology Lab, Division of Neurosurgery, Medical College of Virginia.

Techniques and experience: Utilizing the material and methods used in gene therapy with special emphasis on molecular biology techniques such as Northern blots, Western analysis, and PCR. Use of microinfusion techniques as the delivery systems for infusion of gene therapy vectors. Familiarity with in vitro and in vivo use of adenoviruses for transfection of malignant tumor cells.

1990-1992:

Department of Physiology, University of Maryland at College Park.

Study of the characteristics of acoustic nerve regeneration in Oscar fish. The study involved learning different techniques in order to remove and grow the nerve in culture; manipulate the conditions and study the response. The techniques included microdissection, tissue and cell culture growth, preparation of histochemistry slides, microscopic identification and photography.

INDEPENDENT RESEARCH

- Study of peripheral benzodiazepine receptor expression in glioblastomas.
- Study of telomerase activity in malignant human CNS tumor cell lines.
- Retrospective study of head injury outcomes at the Medical College of Virginia.
- Retrospective study of anterior cervical fusion outcomes.

PROJECTS

- Development and maintenance of cadaver dissection lab. This lab is used to study different craniotomy approaches and the anatomical structures encountered. The ultimate goal is to use the lab as a teaching tool for residents and also to focus on detailed anatomical dissections and techniques involved in skull base surgery.
- Development and maintenance of microvascular lab. This lab allows the participants to learn and practice skills involved in microvascular surgery in a controlled and safe manner.

PRESENTATIONS & LECTURES

- Back Pain.** JFK Hospital Lecture Series. Boynton Beach, FL. October 2007.
- Surgical and Non-Surgical Approaches to Hemorrhagic Stroke.** Crossing the Synapse. 2nd Annual Stroke Symposium. Florida Hospital System. Daytona Beach, FL. September 2007.
- Kyphoplasty.** Faculty for hands-on course for Kyphoplasty. CNS meeting in Denver, CO. October 2003.
- Intraoperative monitoring.** Presented at the Neurosurgical Grand Rounds at the Wayne State

University. Sep. 2002.

-Cranial Nerve Ganglia. Presented at the Neurosurgical Grand Rounds at the Wayne State University. Dec. 2001.

-Effects of Shunt Treatment on the GnRH System in Congenital Hydrocephalus. Presented at the pediatric section of the American Association of Neurological Surgeons meeting in Atlanta. Methods and data presentation. Oct. 1999.

-Protein synthetic capacity of cortical neurons during experimental hydrocephalus: effects of early and late decompression. Presented at the pediatric section of the Congress of Neurological Surgeons annual meeting in Seattle. Methods and data presentation. Oct. 1998.

-Head injury at MCV. Presented at the Department of Neurosurgery Grand Rounds at MCV. Discussion of the incidence, mortality rate, cause of death and autopsy data of patients with severe and moderate head injury admitted to MCV from 1989 to 1995. Slide presentation, discussion, and case presentation. Jan. 1996.

-Headache in children. Presented at the Department of Pediatrics' meeting at MCV. Discussion of causes of headache in children with emphasis on intracranial mass as a possible etiology. Data, discussion, and case presentation. Oct. 1995.

-Hydrocephalus. Presented at the Department of Neurosurgery Grand Rounds at MCV. Discussion of causes and treatment of hydrocephalus with emphasis on shunt complications and failure. Statistics, discussion and case presentation. Sep. 1995.

ABSTRACTS

Abdolvahabi RM, Cortese JJ, Mitchell JA, Rafols BC, White BC, Diaz FG, McAllister JP. Effects of Shunt Treatment on the GnRH System in Congenital Hydrocephalus. Poster presentation at the 17th Annual National Neurotrauma Society Meeting, October 1999.

Abdolvahabi RM, Cortese JJ, Mitchell JA, Rafols BC, White BC, Diaz FG, McAllister JP. Intraventricular Shunts Attenuate Hydrocephalus-Related Alterations in the GnRH System in the H-Tx Rat. Poster presentation at the Society for Neuroscience meeting October 1999.

Abdolvahabi RM, Wolfgang CL, Diaz FG, McAllister JP. Protein synthetic capacity of cortical neurons during experimental hydrocephalus: effects of early and late decompression. Congress of Neurological Surgeons, Annual meeting 1998.

PUBLICATIONS

Abdolvahabi RM, Sloan A, Hlatky R. Gliomas. In Rengachary and Ellenbogen (eds.) Principles Of Neurosurgery, Elsevier publishing.

Abdolvahabi RM, Dutcher SA, Wellwood JM, Michael DB. Craniocerebral Missile Injury.

Neurological Research 2001;**23**: 210-218.

Abdolvahabi RM, Cortese JJ, Mitchell JA, Canady AI, Diaz FG, McAllister JP. The Effects of Congenital Hydrocephalus on the Hypothalamic Gonadotrophin Releasing Hormone System. Submitted to Brain Research Aug. 2000.

Abdolvahabi RM, Mitchell JA, Diaz FG, McAllister JP. A Brief Review of the Effects of Chronic Hydrocephalus on the Gonadotropin Releasing Hormone System: Implications for Amenorrhea and Precocious Puberty. *Neurological Research.* 2000;1:123-126.