47TH ANNUAL MEETING OF THE AANS/CNS SECTION ON PEDIATRIC NEUROLOGICAL SURGERY

SETTING THE STAGE FOR COLLABORATION
DECEMBER 6-9, 2018
OMNI NASHVILLE HOTEL
NASHVILLE

AANS360
GET THE MEETING APP AT 360.AANS.ORG

47TH ANNUAL MEETING OF THE AANS/CNS SECTION ON PEDIATRIC NEUROLOGICAL SURGERY
## THURSDAY, DEC. 6

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tbody>
<tr>
<td>6:45 a.m.-8 p.m.</td>
<td>Registration</td>
<td>Fifth Avenue Pre-function; 2nd level</td>
</tr>
<tr>
<td>8 a.m.-4:30 p.m.</td>
<td>Advanced Practice Provider (APP) Seminar</td>
<td>Broadway Ballroom GH; 2nd level</td>
</tr>
<tr>
<td>12-4 p.m.</td>
<td>Pediatric Section Executive Committee Meeting</td>
<td>Cumberland 5 &amp; 6; 3rd level</td>
</tr>
<tr>
<td>1-5 p.m.</td>
<td>Pediatric Neurosurgical Coding: Current Challenges, Practical Strategies</td>
<td>Cumberland 1; 3rd level</td>
</tr>
<tr>
<td>4-4:30 p.m.</td>
<td>Pediatric Section Education Committee Meeting</td>
<td>Cumberland 5 &amp; 6; 3rd level</td>
</tr>
<tr>
<td>6-8 p.m.</td>
<td>Opening Reception</td>
<td>Country Music Hall of Fame (adjacent to the Omni Nashville Hotel)</td>
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</tbody>
</table>
## PROGRAM AT A GLANCE

### FRIDAY, DEC. 7

<table>
<thead>
<tr>
<th>Time</th>
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<tbody>
<tr>
<td>6 a.m.-5 p.m.</td>
<td>Registration</td>
<td>Fifth Avenue Pre-function; 2nd level</td>
</tr>
<tr>
<td>7:15-8 a.m.</td>
<td>Continental Breakfast in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
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<tr>
<td></td>
<td><em>Neuro Zone: Meet the Leadership</em></td>
<td></td>
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<tr>
<td>7:15 a.m.-4 p.m.</td>
<td>Exhibit Hall Open</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>8:01-9:53 a.m.</td>
<td>Scientific Session I: Craniosynostosis/Developmental</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>9:54-10:24 a.m.</td>
<td>Beverage Break in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>10:25-11:44 a.m.</td>
<td>Scientific Session II: Hydrocephalus I</td>
<td>Broadway Ballroom West</td>
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<tr>
<td></td>
<td><em>Raimondi Lecture—Jon Meacham</em></td>
<td></td>
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<tr>
<td>11:45 a.m.-12:45 p.m.</td>
<td>Lunch in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>12:46-2:59 p.m.</td>
<td>Scientific Session III: Oncology I <em>Symposium I: Collaborative Research</em></td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>3-3:30 p.m.</td>
<td>Beverage Break in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td></td>
<td><em>Neuro Zone: Conversation with Drs. Brockmeyer, Kestle, Leonard and Limbrick</em></td>
<td></td>
</tr>
<tr>
<td>3:31-4:24 p.m.</td>
<td>Scientific Session IV: Trauma/Critical Care</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>4:25-4:40 p.m.</td>
<td>Pediatric Section Annual Business Meeting</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>4:41-4:56 p.m.</td>
<td>AAP Section on Neurological Surgery (SONS) Business Meeting</td>
<td>Broadway Ballroom West</td>
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</tbody>
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Note: Time and location subject to change
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<tr>
<td>7:15-8 a.m.</td>
<td>Continental Breakfast in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>7:15 a.m.–5:30 p.m.</td>
<td>Exhibit Hall Open</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>8:01-9:45 a.m.</td>
<td>Scientific Session V: Functional I Symposium II: Global Pediatric Neurosurgery: Opportunities for Involvement</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>9:46-10:16 a.m.</td>
<td>Beverage Break in the Exhibit Hall Neuro Zone: Conversation with Drs. Dewan, Harkness, Johnston and Warf</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>10:17 a.m.-12:10 p.m.</td>
<td>Scientific Session VI: Spine/ Socioeconomic AAP/SONS Lecture—Dr. Allen Sills</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>12:11-1:11 p.m.</td>
<td>Lunch in the Exhibit Hall Neuro Zone: Conversation with Dr. Sills</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>1:12-2:44 p.m.</td>
<td>Scientific Session VII: Functional II Chairman Address Poster Viewing</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>2:45-3:15 p.m.</td>
<td>Beverage Break in the Exhibit Hall Neuro Zone: First Raffle Drawing</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>3:16-4:29 p.m.</td>
<td>Scientific Session VIII: Hydrocephalus II/Oncology II</td>
<td>Broadway Ballroom West</td>
</tr>
<tr>
<td>4:30-5:30 p.m.</td>
<td>Wine &amp; Cheese Reception in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
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## PROGRAM AT A GLANCE

### SUNDAY, DEC. 9

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<thead>
<tr>
<th>Time</th>
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<tbody>
<tr>
<td>6-11 a.m.</td>
<td>Registration</td>
<td>Fifth Avenue Pre-function; 2nd level</td>
</tr>
<tr>
<td>7:15-8 a.m.</td>
<td>Continental Breakfast in the Exhibit Hall</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>7:15-10:30 a.m.</td>
<td>Exhibit Hall Open</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>9:40-10:10 a.m.</td>
<td>Beverage Break in the Exhibit Hall Neuro Zone: Conversation with Drs. Adelson, Alotaibi and Omary 2nd Raffle Drawing</td>
<td>Broadway Ballroom East</td>
</tr>
<tr>
<td>10-11:30 a.m.</td>
<td>Scientific Session X: Miscellaneous Awards Announced</td>
<td>Broadway Ballroom West</td>
</tr>
</tbody>
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**Joint Providership Accreditation Statement:** This activity has been planned and implemented in accordance with the accreditation requirements and policies of the Accreditation Council for Continuing Medical Education (ACCME) through the joint providership of the AANS and the AANS/CNS Section on Pediatric Neurological Surgery. The AANS is accredited by the ACCME to provide continuing medical education for physicians.

**Designation Statement**

**Continuing Medical Education Credits**
This activity has been approved for *AMA PRA Category 1 Credits™*. Physicians should claim only the credit commensurate with the extent of their participation in the activity.

**Nursing Contact Hours**
This continuing nursing education activity was approved by the Ohio Nurses Association (OBN-001-91), an accredited approver by the American Nurses Credentialing Center’s Commission on Accreditation.

**CEU Credits**
This program has the prior approval of AAPC for up to 4 continuing education hours. Granting prior approval in no way constitutes endorsement by AAPC of the program content or the program sponsor. The AAPC approval index number for the Pediatric Neurosurgical Coding: Current Challenges, Practical Strategies is valid to October 31, 2019.

**Disclosure Statement:** Before the program, anyone in control of the educational content of this activity will disclose the existence of any financial interest and/or the relationship they or their significant other have with the manufacturer(s) of any commercial product(s) to be discussed during their presentation. Disclosures will be included in the meeting app, accessible at 360.aans.org.
Opening Reception
The Opening Reception will be held at the legendary Country Music Hall of Fame, adjacent to the Omni Nashville Hotel. Attendees will be treated to live music by local band Brother and The Hayes. While networking with colleagues, enjoy museum exhibits depicting the evolving history, enduring beauty, cultural importance and traditions of country music. All registered attendees and guests receive one complimentary ticket to this event.

Meeting App
Find an interactive meeting schedule, attendee and speaker listings, exhibitor map, poster abstracts and more within the AANS 360 app. Visit 360.aans.org to get started.

Join the Conversation in the Neuro Zone
Residents and medical students are invited to meet with leadership on Friday morning during breakfast in the exhibit hall. This casual forum provides an opportunity to introduce young trainees to senior members of the organization. This interaction allows future pediatric neurosurgeons to learn more about pediatric neurosurgery, both the professional and personal aspects. Key speakers will be available for additional dialogue following their talks. Check the program schedule for details.

Raffle Drawings
NEW FOR 2018! Receive one raffle ticket for each exhibit booth visited in the exhibit hall and enter for a chance to win a $250 Amazon gift card (two prizes awarded) or a $500 Amazon gift card (one prize awarded). Winners must be present at the time of the drawing. The raffle drawings will be held during the Saturday afternoon beverage break and the Sunday morning beverage break.

Abstracts and Poster Presentations
Poster presenters will be available to answer questions on Saturday, immediately following the Chairman Address. View posters and visit with presenters in the back of the general session room. Posters will be available for viewing throughout the meeting.

Photography and Capture
By registering/attending this meeting, you grant the AANS the right to use captured images, videos and biographies in print, electronic or other media. All postings become the property of the AANS and may be displayed, distributed or used by the AANS for any purpose. Attendees are prohibited from live streaming, photography and video capture without the consent of the AANS. The AANS is not responsible for unauthorized media capture performed by meeting attendees.
THURSDAY, DEC. 6
(ticket required)

6:45 a.m.–8 p.m.
Registration Desk
Location: Fifth Avenue Pre-function; 2nd level

7 a.m.–6 p.m.
Speaker Ready Room
Location: Mockingbird 1; 3rd level

8–8:05 a.m.
Welcome & Introductions
Location: Broadway Ballroom
Salon GH; 2nd level
E. Haley Vance, DNP, APRN, CPNP-AC

8:06–8:36 a.m.
Advanced Practice Health &
Well-being Update
Marilyn Dubree, MSN, RN, NE-BC

8:37–9:07 a.m.
Spine: Congenital vs. Traumatic
Christopher Michael Bonfield, MD, FAANS

9:08–9:38 a.m.
Advances in Epilepsy Treatment: Laser
Ablation, Stereo EEG
Carrie Rebecca Muh, MD, FAANS

9:39–10:09 a.m.
Open vs. Endoscopic Craniofacial;
Outcomes Syndromic Patients;
Indications for Surgery vs. Observation
Mandeep Singh Tamber, MD, PhD, FAANS

10:10–10:30 a.m.
Beverage Break

10:31–11:01 a.m.
Neuroimaging: Normal Variant vs.
Abnormality Brain and Spine
Sumit Pruthi, MD

11:02–11:29 a.m.
Hydrocephalus: ETV vs. Shunt
Jay K. Riva-Cambrin, MD, MSc, FAANS

11:30–11:59 a.m.
Brain Tumors/Endocrine Abnormalities
Todd Cameron Hankinson, MD,
MBA, FAANS
12–12:59 p.m.
Lunch and Networking
Location: Grand View Terrace; 2nd level

1:00–1:59 p.m.
Panel Discussion: Spina Bifida/Symptomatic Tethered Cord
Moderator
E. Haley Vance, DNP, APRN, CPNP-AC
Panelists
Megan Johnson, MD
Stacy Tanaka, MD, MS
John C. Wellons III, MD, FAANS

2–2:14 p.m.
Beverage Break

2:15–4:30 p.m.
Track 1: Hands-on Stations
Location: Cumberland 3; 3rd level
- Placement & Troubleshooting of EVDs
- Placement & Troubleshooting of ICP Monitors
- Baclofen Pumps Reprogram/Refill
- Shunts Reprogram
Supported by educational grants from Medtronic and Sophysa USA Inc. In-kind equipment supported by Medtronic, Natus Neuro Incorporated and Sophysa USA Inc.

2:15–4:30 p.m.
Track 2: Lecture Series
Location: Broadway Ballroom GH; 2nd level

2:15–2:45 p.m.
Chiari: Bone Only vs. Duraplasty
David Delmar Limbrick Jr., MD, PhD, FAANS

2:46–3:16 p.m.
Cerebrovascular Disease and Treatments: Indications for Open Surgery vs. Endovascular Treatment vs. SRS
Edward Robert Smith, MD, FAANS
Jennifer Klein, FNP

3:17–3:47 p.m.
Spasticity
Robert Partlow Naftel, MD, FAANS

3:48–4:30 p.m.
Advanced Practice Provider Research, Collaboration and Project Ideas Panel
Moderator
Chevis Shannon, MBA, MPH, DrPH
Panelists
Allie Mains, APRN
Julie Miller, PhD, MSN, APRN, FNP-C, CPNP-AC
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<td>Speaker Ready Room</td>
<td>Mockingbird 1; 3rd level</td>
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<tr>
<td>11:30 a.m.–12:30 p.m.</td>
<td>Executive Committee Lunch</td>
<td>Cumberland 5 &amp; 6; 3rd level</td>
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<td>12–4 p.m.</td>
<td>Executive Committee Meeting</td>
<td>Cumberland 5 &amp; 6; 3rd level</td>
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<td>1–5 p.m.</td>
<td>Pediatric Neurosurgical Coding: Current Challenges, Practical Strategies</td>
<td>Cumberland I; 3rd level</td>
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<tr>
<td>4–4:30 p.m.</td>
<td>Education Committee</td>
<td>Cumberland 5 &amp; 6; 3rd level</td>
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<tr>
<td>6–8 p.m.</td>
<td>Opening Reception</td>
<td>Country Music Hall of Fame</td>
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</table>

**Educational Topics:***

- **Pediatric Neurosurgical Coding:**
  - **Director:** Curtis J. Rozzelle, MD, FAANS
  - **Faculty:**
    - Laurie Lynn Ackerman, MD, FAANS
    - Christopher Michael Bonfield, MD, FAANS
    - Lance Shane Governale, MD, FAANS
    - David Houston Harter, MD, FAANS
    - Catherine Anne Mazzola, MD, FAANS

### FRIDAY, DEC. 7

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<td>Continental Breakfast in the Exhibit Hall</td>
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<td>8:01–9:53 a.m.</td>
<td>Scientific Session I: Craniosynostosis/Developmental</td>
<td>Broadway Ballroom West; 2nd level</td>
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<tr>
<td>8:01–8:05 a.m.</td>
<td>Welcome and Opening Remarks</td>
<td>Broadway Ballroom East; 2nd level</td>
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</tbody>
</table>
| 2018 Annual Meeting Program Committee               | Christopher Michael Bonfield, MD, FAANS
|              | Robert Partlow Naftel, MD, FAANS
|              | Chevis Shannon, MBA, MPH, DrPH
|              | E. Haley Vance, DNP, APRN, CPNP-AC
|              | John C. Wellons III, MD, FAANS

**Educational Topics:**

- **Scientific Session I: Craniosynostosis/Developmental**
  - **Moderators:**
    - Andrew B. Foy, MD, FAANS
    - Sandi K. Lam, MD, FAANS

**Support:**

- Supported by First Tennessee Bank and Medtronic

**Event Location:**

- **Country Music Hall of Fame**
  - Enjoy music by Brother and The Hayes
  - Tour the museum

**Supported by:**

- First Tennessee Bank
- Medtronic
8:06–8:08 a.m.
Collaborative Research Proposal: Autograft or Synthetic: A Randomized Controlled Trial for Pediatric Cranioplasty
Brandon G. Rocque, MD, MS, FAANS

GROUP 1
8:09–8:15 a.m.
1. Socioeconomic and Demographic Factors in the Diagnosis and Treatment of Chiari I Malformation and Syringomyelia: A Study Using the Park-Reeves Syringomyelia Research Consortium Database
Syed Hassan Akbari, MD

8:16–8:22 a.m.
2. A retrospective multicenter study of surgical site infection following complex tethered cord surgery: Is current antibiotic prophylaxis adequate?
Nikita Alexiades, MD

8:23–8:29 a.m.
3. Normal Morphometric Changes at the Craniocervical Junction Throughout Childhood
Amy Katherine Bruzek, MD

8:30–8:36 a.m.
4. Creation of a Predictive Model of Post-operative Hydrocephalus in Patients with Chiari-I Malformation and Syringomyelia Undergoing Posterior Fossa Decompression: A Study from the Park-Reeves Research Consortium
Andrew Hale

8:37–8:43 a.m.
Group 1 Discussion

GROUP 2
8:44–8:50 a.m.
5. Virtual surgical planning in craniosynostosis: When is preoperative modeling cost-effective?
Christine Jones, MD

8:51–8:57 a.m.
6. Combining Preoperative Erythropoietin and Intraoperative Tranexamic Acid Reduces Transfusions and Length of Stay in Sagittal Craniosynostosis Surgery
Paul Joseph Escher

8:58 a.m.–9:04 a.m.
7. The Economic Impact of Open vs. Endoscopic-Assisted Craniosynostosis Repair
Campbell Liles

9:05–9:11 a.m.
8. Large Single Institution Series of Endoscopically Treated Infants with Craniosynostosis
Coleman Riordan

9:12–9:18 a.m.
Group 2 Discussion

GROUP 3
9:19–9:25 a.m.
9. Comparison of follow-up length matched spina bifida post-natal cohort to the MOMs trial: Are the gains durable?
Michael M. McDowell, MD
9:26–9:32 a.m.
10. Is Fetal Ventricular Size Predictive of Developing Hydrocephalus After Prenatal Repair of Myelomeningocele?
Laura Prolo, MD, PhD

9:33–9:39 a.m.
11. Thirty Day, 90 Day, and 1 Year Pediatric Readmission Rates Following Fetal vs Neonatal Myelomeningocele Repair
Michael Cools, MD

9:40–9:46 a.m.
12. Multi-Layer Fetoscopic Repair of Open Neural Tube Defects: Early Perinatal Outcomes
Vijay Mysore Ravindra, MD

9:47–9:53 a.m.
Group 3 Discussion

9:54–10:24 a.m.
Beverage Break in the Exhibit Hall
Location: Broadway Ballroom East; 2nd level

10:25–11:44 a.m.
Scientific Session II: Hydrocephalus I
Location: Broadway Ballroom West; Omni Nashville
Moderators
Eric M. Jackson, MD, FAANS
Jonathan A. Pindrik, MD

10:25–10:27 a.m.
Collaborative Research Proposal: ETV+CPC versus Shunts for Infant Hydrocephalus: A Comparison of the Caregivers’ Attitudes of their Children’s Outcomes
Jay K. Riva-Cambrin, MD, MSc, FAANS

10:28–10:34 a.m.
13. Predictors of ETV Ostomy Status in Patients Who Fail ETV/CPC
Amanda Stanton

10:35–10:41 a.m.
14. The Utility of Endoscopic Third Ventriculostomy and Choroid Plexus Cauterization for the treatment of pediatric hydrocephalus in Haiti
John Ragheb, MD, FAANS

10:42–10:48 a.m.
15. Shunt to Endoscopic 3rd Ventriculostomy Conversion—A Multicenter Experience
Pooja Dave

10:49–10:55 a.m.
16. ETV After Initial ETV+CPC Failure: a Hydrocephalus Clinical Research Network Registry Review
Curtis J. Rozzelle, MD, FAANS

10:56–11:02 a.m.
Group 4 Discussion

11:03 a.m.–11:44 a.m.
Raimondi Lecture: The Art of Leadership: Reflections from the American Presidency
Jon Meacham

11:45 a.m.–12:45 p.m.
Lunch in the Exhibit Hall
Location: Broadway Ballroom East; 2nd level
12:46–2:59 p.m.  
**Scientific Session III: Oncology I**  
**Location:** Broadway Ballroom West; 2nd level  
**Moderators**  
David John Daniels, MD, PhD  
Eric M. Thompson, MD, FAANS  
12:46–12:48 p.m.  
**Collaborative Research Proposal:**  
In vivo Imaging Models of DIPG Molecular Signatures and Response to Therapy  
Umberto Tosi  

**GROUP 5**  
12:49–12:55 p.m.  
★ 17. Poliovirus receptor (CD155) expression in pediatric brain tumors mediates oncolysis of medulloblastoma and pleomorphic xanthoastrocytoma  
Eric M. Thompson, MD, FAANS  
12:56–1:02 p.m.  
★ 18. Technical Feasibility and Safety of Repeated Infusions with Convection Enhanced Delivery for Diffuse Intrinsic Pontine Glioma  
Peter F. Morgenstern, MD  
1:03–1:09 p.m.  
★ 19. Hypothalamic Obesity as a Long-term Outcome of Pediatric Craniopharyngioma: New Predictive Score  
Mohammed Fouda, MD  

1:10–1:16 p.m.  
20. Diffusion MRI: Novel Application in Post-Hemorrhagic Hydrocephalus of Prematurity and Cross-Validation with CSF Biomarkers  
Diego Martin Morales  
1:17–1:23 p.m.  
Group 5 Discussion  

**GROUP 6**  
1:24–1:30 p.m.  
★ 21. Non-invasive Prediction of Molecular Subtypes in Medulloblastoma: Development of MRI-based Imaging Signatures  
Jennifer Lauren Quon, MD  
1:31–1:37 p.m.  
★ 22. Supratentorial Pediatric High-Grade Gliomas Involved with the Subventricular Neural Stem Cell Niche Are Associated with Decreased Survival: A Multi-Institutional Retrospective Study  
Akshitkumar Maheshbhai Mistry, MD  
1:38–1:44 p.m.  
★ 23. Magnetic Resonance-guided Stereotactic Laser Ablation Therapy for the Treatment of Pediatric Brain Tumors: A Multi-Institutional Retrospective Study  
Elsa Arocho-Quinones, MD  
1:45–1:51 p.m.  
24. Increased Naïve B-cell Infiltrate in SHH subgroup of Medulloblastoma with PTCH1 Mutation  
Winson Ho, MD
1:52–1:58 p.m.
Group 6 Discussion

1:59–2:59 p.m.
Symposium 1: Collaborative Research
Moderator
David Delmar Limbrick Jr., MD, PhD, FAANS
Panelists
Douglas L. Brockmeyer, MD, FAANS
John R. W. Kestle, MD, FAANS
Jeffrey R. Leonard, MD, FAANS

3–3:30 p.m.
Beverage Break in the Exhibit Hall
Neuro Zone: Conversation with Drs. Brockmeyer, Kestle, Leonard and Limbrick
Location: Broadway Ballroom East; 2nd level

3:31–4:24 p.m.
Scientific Session IV: Trauma/Critical Care
Location: Broadway Ballroom West; 2nd level
Moderators
Jonathan E. Martin, MD, FAANS
Jennifer Strahle, MD

Section Research Grants
3:31–3:37 p.m.
Selective Vulnerability of Unmyelinated Axon Segments Following Diffuse Traumatic Brain Injury
Brian Joseph Kelley, MD, PhD

3:38–3:44 p.m.
The Blood Tumor Barrier in Pediatric Primary Malignant Brain Tumors
Annie Drapeau, MD

3:45–3:51 p.m.

25. Outcomes in Pediatric Patients with Blunt Head Trauma and a Glasgow Coma Scale Score of 3 at Presentation
Duncan Trimble

26. Concussion Recovery Differences in Children Injured During the School Year vs. Summer Months
Joseph A. Petronio, MD

3:59–4:05 p.m.

27. Malignant Cerebellar Edema Syndrome in Toddlers With Following Exposure/Ingestion of Prescription Opioids
Laurie Lynn Ackerman, MD, FAANS

4:06–4:12 p.m.

28. Improved Outcomes for Pediatric Traumatic Intracranial Hemorrhage Patients at High-Volume Hospitals
Oliver Tang

4:13–4:19 p.m.
Group 7 Discussion

4:20–4:24 p.m.
Announcement—Pediatric Guidelines Committee
David F. Bauer, MD, FAANS

4:25–4:40 p.m.
AANS/CNS Section on Pediatric Neurological Surgery Annual Business Meeting

4:41–4:56 p.m.
AAP/SONS Business Meeting

★ Signifies Award Candidate
**SATURDAY, DEC. 8**

6 a.m.–5 p.m.
Registration Desk
Location: Fifth Avenue Pre-function; 2nd level

7 a.m.–4 p.m.
Speaker Ready Room
Location: Mockingbird 1; 3rd level

7:15–8 a.m.
Continental Breakfast in the Exhibit Hall
Location: Broadway Ballroom East; 2nd level

8:01–9:45 a.m.
Scientific Session V: Functional I
Location: Broadway Ballroom West; 2nd level

Moderators
Joshua J. Chern, MD, PhD, FAANS
Caitlin Elizabeth Hoffman, MD

8:01–8:06 a.m.
2019 Scottsdale Preview
P. David Adelson, MD, FAANS

8:07–8:09 a.m.
Collaborative Research Proposal:
Neural Network Organization In Focal Cortical Dysplasia Epilepsy
Raheel Ahmed, MD

GROUP 8

8:10–8:16 a.m.
29. Seizure Outcomes Following Resective Epilepsy Surgery in Tuberous Sclerosis Patients: A Comparison Between TSC1 and TSC2 Gene Mutations
Omeed Modiri

8:17–8:23 a.m.
★ 30. Brain Structural Connectivity Predicts Seizure Response to Vagus Nerve Stimulation
Karim Mithani

8:24–8:30 a.m.
★ 31. Evaluation of Extreme Gradient Boosting Tree Classification of Epilepsy with Resting State MRI Latency Features
Ryan Dinh Nguyen

8:31–8:37 a.m.
★ 32. Surgical Management of Pediatric Patients with Encephalopathy Related to Electrical Status Epilepticus During Sleep (ESES)—an Institutional Case Series
Shelly Wang, MD

8:38–8:44 a.m.
Group 8 Discussion

8:45–9:45 a.m.
Symposium II: Global Pediatric Neurosurgery: Opportunities for Involvement
Moderator
James M. Johnston Jr., MD, FAANS

Panelists
Michael Dewan, MD, MSCI
William Harkness, MD
Benjamin C. Warf, MD

9:46–10:16 a.m.
Beverage Break in the Exhibit Hall
Neuro Zone: Conversation with Drs. Dewan, Harkness, Johnston and Warf
Location: Broadway Ballroom East; 2nd level
10:17 a.m.–12:10 p.m.
Scientific Session VI: Spine/Socioeconomic
Location: Broadway Ballroom West; 2nd level
Moderators
Mari Louise Groves, MD
Todd Cameron Hankinson, MD, MBA, FAANS

GROUP 9
10:17–10:23 a.m.
33. Assessment of craniocervical junction motion on plain cervical spine flexion-extension radiographs in patients with Down Syndrome: a pilot study comparing two measurement techniques
Jonathan E. Martin, MD, FAANS

10:24–10:30 a.m.
34. Pediatric Occipital Condyle Morphometric Analysis Using Computed Tomography with Evaluation for Occipital Condyle Screw Placement
Khoi Nguyen, MD

10:31–10:37 a.m.
35. Epidemiology of Pediatric Cervical Spine Injury Following Blunt Trauma
Jeffrey R. Leonard, MD, FAANS

10:38 a.m.–10:44 a.m.
36. Spinal column shortening for secondary tethered cord syndrome in the pediatric age group
Katrina Alise Ducis, MD

10:45–10:51 a.m.
Group 9 Discussion

GROUP 10
10:52–10:58 a.m.
37. Pediatric Neurosurgical Education During Residency Training: A Survey of US Training Programs
Natalie Limoges, DO

10:59–11:05 a.m.
★ 38. Capacity building for the surgical treatment of pediatric epilepsy in Vietnam: A model for international collaboration
Faizal Haji, MD, PhD

11:06–11:12 a.m.
★ 39. Variation in Hospital Charges in Patients with External Ventricular Drains: Comparison between Intensive Care and Surgical Floor
Abdullah H. Feroze, MD

11:13–11:19 a.m.
40. A contemporary ranking of pediatric neurosurgery fellowship programs by post-fellowship publishing productivity
Paul Klimo Jr., MD, FAANS

11:20–11:26 a.m.
Group 10 Discussion

11:27 a.m.–12:10 p.m.
AAP/SONS Lecture: Is There a Future for Football?
Allen Kent Sills, MD, FAANS

12:11–1:11 p.m.
Lunch in the Exhibit Hall
Neuro Zone: Conversation with Dr. Sills
Location: Broadway Ballroom East; 2nd level

★ Signifies Award Candidate
1:12–2:44 p.m.
Scientific Session VII: Functional II
Location: Broadway Ballroom West; 2nd level
Moderators
Gregory W. Albert, MD, FAANS
Elizabeth C. Tyler-Kabara, MD, PhD, FAANS

1:12–1:15 p.m.
Special Announcement
Marion (Jack) L. Walker, MD, FAANS(L)

1:16–1:18 p.m.
CHAIRMAN ADDRESS
Introduction
Edward Robert Smith, MD, FAANS

1:19–1:35 p.m.
Mark R. Proctor, MD, FAANS
Section Chair

1:36–2:05 p.m.
Poster Viewing
Poster authors are available at their poster board displays to answer questions.

2:06 p.m.
Poster Winners Announced

2:17–2:23 p.m.
★ 42. Developing a de novo Stereotactic Electroencephalography (SEEG) Program: A Multi-institutional Pediatric Experience
Jacob Richard Lepard, MD

2:24–2:30 p.m.
★ 43. Post-operative Outcomes Following Pediatric Intracranial Electrode Monitoring: a Case for Stereoelectroencephalography (SEEG)
Lily H. Kim

2:31–2:37 p.m.
★ 44. Limitations and Work-Arounds for Common Issues in Stereotactic Electroencephalography (sEEG) Management
Hannah Goldstein, MD

2:38–2:44 p.m.
Group 11 Discussion

2:45–3:15 p.m.
Beverage Break in the Exhibit Hall
Neuro Zone: First Raffle Prize Drawing
Location: Broadway Ballroom East; 2nd level

3:16–4:30 p.m.
Scientific Session VIII: Hydrocephalus II/Oncology II
Location: Broadway Ballroom West; 2nd level
Moderators
Scott W. Elton, MD, FAANS
Christina Marie Notarianni, MD, FAANS

GROUP 11
2:10–2:16 p.m.
★ 41. Corpus Callosotomy Performed with Laser Interstitial Thermal Therapy—An Initial Experience
Jarod Roland, MD
3:16–3:18 p.m.
Collaborative Research Proposal:
Identifying Predictors for
Unchanged Ventricular Size during
Ventriculoperitoneal Shunt Malfunction
Rebecca Anne Reynolds, MD

GROUP 12
3:19–3:25 p.m.
45. Temporal Trends in Surgical
Procedures for Pediatric
Hydrocephalus – An Analysis of the
HCRN Core Data Project
Mandeep Singh Tamber, MD, PhD, FAANS

3:26–3:32 p.m.
★★ 46. 30 Years Single Institutional
Experience with Pediatric
Craniopharyngioma—A New
Algorithm for Management
Mohammed Fouda, MD

3:33–3:39 p.m.
★★ 47. Quality of Life of Children with
Hydrocephalus: A Comparison of Child
Self-Assessment and Caregiver Proxy
Kathrin Zimmerman

3:40–3:46 p.m.
48. Correlations between Brain
Elastance, Headaches and Ventricular
Size using Magnetic Resonance
Elastography
James (Pat) Patterson McAllister II, PhD

3:47–3:53 p.m.
Group 12 Discussion

★★ Signifies Award Candidate
GROUP 13
3:54–4 p.m.
49. Acute Inflammation and Oxidative Stress in a Rat Model of Neonatal Intraventricular Hemorrhage
Brandon Andrew Miller, MD

4:01–4:07 p.m.
★ 50. Increased Mean Diffusivity in the Olive is Predictive of Posterior Fossa Syndrome
Derek Yecies, MD

4:08–4:14 p.m.
★ 51. Quantification of white matter injury in hydrocephalus using fast brain MRI mean diffusivity tensors
Albert Isaacs, MD

4:15–4:21 p.m.
52. Tumors of the Cerebello-medullary Angle: Anatomical Classification and Retrospective Analysis of 60 Pediatric Patients
Mary Virginia Portera

4:22–4:28 p.m.
Group 13 Discussion

4:29 p.m.
Announcement

SUNDAY, DEC. 9
6–11 a.m.
Registration Desk
Location: Fifth Avenue Pre-function; 2nd level

7–11 a.m.
Speaker Ready Room
Location: Mockingbird 1; 3rd level

7:15–8 a.m.
Continental Breakfast in the Exhibit Hall
Location: Broadway Ballroom East; 2nd level

8:01–9:39 a.m.
Scientific Session IX: Vascular
Location: Broadway Ballroom West; 2nd level
Moderators
Edward S. Ahn, MD, FAANS
Stephanie Greene, MD, FAANS

8:01–8:03 a.m.
Collaborative Research Proposal: Cerebral Revascularization in Sickle Cell Disease with Moyamoya Syndrome
Philipp R. Aldana, MD, FAANS

GROUP 14
8:04–8:10 a.m.
53. Results of Twenty-Year or Greater Follow-Up in Pediatric Patients with Moyamoya Disease After Pial Synangiosis.
Coleman Riordan

4:30–5:30 p.m. (ticket required)
Wine & Cheese Reception in the Exhibit Hall
Location: Broadway Ballroom East; 2nd level
Supported by Codman Specialty Surgical, a Division of Integra LifeSciences
8:11 a.m.–8:17 a.m.
★ 54. Long Term Outcomes of Pediatric Arteriovenous-Malformations: The 30-Year Pittsburgh Experience
   Michael M. McDowell, MD

8:18–8:24 a.m.
★ 55. Surgical Revascularization Versus Conservative Management in Children with Moya-Moya Syndrome: A North American Cohort Study
   Lior Elkaim

8:25–8:31 a.m.
★ 56. Surgical Revascularization in Children with Sickle Cell Disease and Moyamoya Syndrome
   Matthew Kruchten

8:32–8:38 a.m.
Group 14 Discussion

8:39–9:39 a.m.
Symposium III: Social Media in Pediatric Neurosurgery: Is it Useful?
Moderator
John C. Wellons III, MD, FAANS
Panelists
P. David Adelson, MD, FAANS
Naif M. Alotaibi, MD
Reed A. Omary, MD, MS

9:40–10:10 a.m.
Beverage Break in the Exhibit Hall
Neuro Zone: Conversation with Drs. Alotaibi, Adelson, Omary and Wellons; and Second Raffle Prize Drawing
Location: Broadway Ballroom East; 2nd level

10:11–11:30 a.m.
Scientific Session X: Miscellaneous
Location: Broadway Ballroom West; 2nd level
Moderators
Sarah C. Jernigan, MD, FAANS
Luke Tomycz, MD

10:11–10:13 a.m.
Collaborative Research Proposal: Multi-institutional Stereotactic Electroencephalography (SEEG) Database
Jacob Richard Lepard, MD

10:21–10:27 a.m.
★ 57. Short-term seizure outcomes in pediatric patients with focal drug-resistant epilepsy undergoing MRI-guided laser interstitial thermal therapy
   George Yang, MD

10:28–10:34 a.m.
★ 58. Inter-rater Reliability of the Imaging Parameters Defined by the Common Data Elements for Chiari I Malformation
   Esther B. Dupepe, MD, MSPH

10:40–10:50 a.m.
★ 59. Meta-Analysis of Spinal Deformities Following Selective Dorsal Rhizotomy
   Matthew Wheelwright

★ Signifies Award Candidate
10:35–10:41 a.m.
★ 60. Cross-Sectional Evaluation of Transition Readiness in the Interdisciplinary Spina Bifida Clinic
Elizabeth Naylor Kuhn, MD

10:42–10:48 a.m.
Group 15 Discussion

GROUP 16
10:49–10:55 a.m.
★ 61. Management of Chiari 1.5 with C1 Laminectomy and Tonsillar Coagulation
Hannah Goldstein, MD

10:56–11:02 a.m.
62. VEGF as driver of moyamoya transdural vasculogenesis: Mechanistic and biomarker correlation
Edward Robert Smith, MD, FAANS

11:03–11:09 a.m.
63. Neuronal and Synaptic Correlates of High Frequency Oscillations in Pediatric Epilepsy
Simon Levinson

11:10–11:16 a.m.
64. Exome Sequencing Identifies Critical Genetic Determinants of Vein of Galen Malformation
Ava M. Hunt

11:17–11:23 a.m.
Group 16 Discussion

11:24–11:30 a.m.
Announcement of Awards
Mark R. Proctor, MD, FAANS

11:30 a.m.
Closing Remarks
Mark R. Proctor, MD, FAANS

★ Signifies Award Candidate
CONTRIBUTING SUPPORT

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