

AMERICAN SPINAL INJURY ASSOCIATION

SCIENTIFIC MEETING

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ATLANTA  GEORGIA
APRIL 16-19, 2023



2023 ANNUAL SCIENTIFIC MEETING

THANK YOU 2023 PARTNERS AND SUPPORTERS!

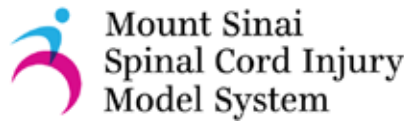
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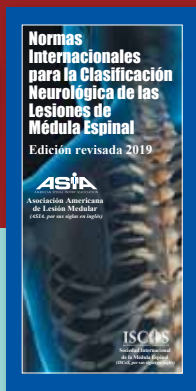
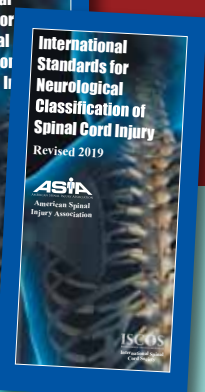
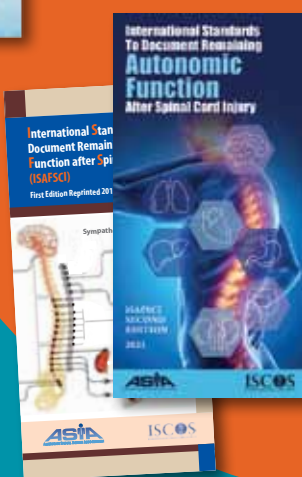
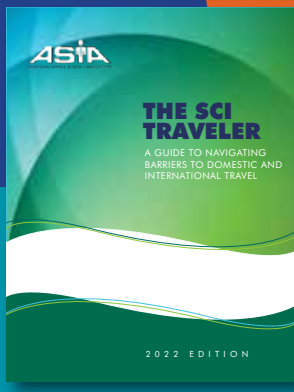
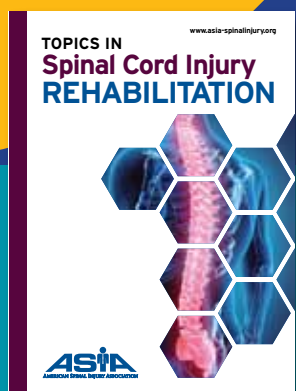
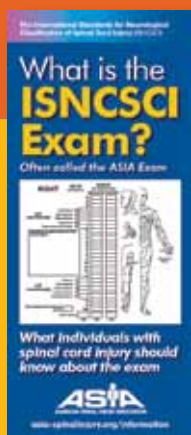
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404.353.9372

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www.asia-spinalinjury.org

ASIA The ISNCSCI Exam

What is the ASIA (or ISNCSCI) Exam?

The International Standards for the Neurological Classification of Spinal Cord Injury - What Young Patients Want to Know

ASIA
American Spinal Injury Association
2020 Poochton Road
Richmond, VA 23220-2005
Phone: 404-855-6200
Fax: 404-855-0200
Email: asia@asia-spinalinjury.org
<http://www.asia-spinalinjury.org>



NEW!

USTeP: Urology

ASIA
LEARNING CENTER



NEW UAB SPAIN INPATIENT REHABILITATION CENTER

Expected to open in 2025, the new UAB Spain Inpatient Rehabilitation Center will be a state-of-the-art 11 story facility with a rooftop courtyard, rehabilitation gym on each floor, outdoor terrain park, office meeting space, and parking for more than 200 vehicles.



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UAB MEDICINE

The University of Alabama at Birmingham



2023 ANNUAL SCIENTIFIC MEETING



Wear your favorite sports team jersey the day of the Precourse.

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PRECOURSE: SCIENCE OF SPORT

PRECOURSE PROGRAM CHAIRS

Amy Bohn, OTR/L
Childrens Healthcare of Atlanta
Atlanta, Georgia

Suzanne Groah, MD
Director of SCI Research
MedStar National Rehabilitation Hospital
Washington, District of Columbia

● [Click Here for Recording](#)

WINDSOR BALLROOM

SUNDAY, APRIL 16TH All Program times are in Eastern Time (ET)

Time	Session Title	Presenters
7:00 AM - 8:00 AM	Breakfast	
8:00 AM - 8:10 AM	Introduction/Opening Remarks	Suzanne Groah, MD
8:10 AM - 8:40 AM	History of Adaptative Sports <i>Participants will gain knowledge of the origins of wheelchair sports as well as understand the evolution of sports based on access, technology, and research.</i>	Robert Murray
8:40 AM - 9:10 AM	Evolution of Classification Across Adaptive Sports <i>An overview of types of classification based on the sport, changes in sport classifications due to research and the expansion of populations participating in sport.</i>	Michelle Lanouette, MS, PT, NCS, ATP
9:10 AM - 9:30 AM	Autonomic Function as a Missing Piece of the Classification of Paralympic Athletes with SCI	Andrei Krassioukov, MD, PhD, FRCPC, FASIA
9:30 AM - 9:50 AM	Maximizing Exercise Capacity to Improve Sports Performance in Athletes with SCI	Christopher West, PhD
9:50 AM - 10:10 AM	Incorporating Rest, Recovery and Nutrition into Sports Training	Jereme Wilroy, PhD
10:10 AM - 10:25 AM	Break	
10:25 AM - 10:45 AM	Access to Fitness <i>Access to online adaptive fitness and emerging development of programs</i>	Harsh Thakkar, CPT
10:45 AM - 11:05 AM	Technology in Sport <i>Technology available and data that can be collected from wearable technology</i>	Hannah Houde

continued

SUNDAY, APRIL 16TH

Time	Session Title	Presenters
11:05 AM - 11:20 AM	The Current State of Paralympic Research and Identified Gaps: A Scoping Review	Kerri Morgan PhD, OTR/L, ATP
11:20 AM - 11:30 AM	Transition to Lunch	
11:30 AM - 12:30 PM	Sponsored lunch	
12:40 AM - 1:20 PM	Who is Appropriate for What Sport and Why? <i>What determines good sport match for individuals with SCI.</i>	Rita Penniman, MS, CTRS, RRT
1:20 PM - 2:00 PM	Equipment.... Where do I begin? <i>Prescribing the proper sports chairs. Seating and positioning considerations will be discussed as related to injury and sport. An Overview of funding challenges and resources</i>	Sarah Leonard, PT, DPT, ATP Jim Black
2:00 PM - 2:15 PM	Break	
2:15 PM - 2:35 PM	Psychology Impacts of Participation in Sports <i>Psychological effects of participation in sport from community to paralympic level, incorporating athletes into peer mentorship programs, and benefits of peer mentorship within the sports communities</i>	Deborah Shapiro, PhD
2:35 PM - 2:50 PM	Incorporation of Peer Mentorship and Sports	Zac Bradley, MS, CRC, NCC
2:50 PM - 3:50 PM	Panel of Athletes - Real Life Experiences <i>Athletes will briefly discuss the impact of sports and mentorship life.</i>	Kerri Morgan PhD, OTR/L, ATP Harsh Thakkar, CPT Zac Bradley, MS, CRC, NCC Bill Furbish
3:50 PM - 4:00 PM	Summary of Day and Explanation of Sport Expo	
4:00 PM - 7:00 PM	Welcome Reception with Sports Expo Venetian Ballroom <i>In this session, participants will have the opportunity to learn about the sport, the diagnosis appropriate for and the resources available for each sport. Participants will have the opportunity to have hands-on experience/competition at each session.</i>	



Congratulations, Dr. Kenneth C. Parsons, Paradigm Medical Director, on receiving the 2023 ASIA Lifetime Achievement Award

Your service and commitment have improved the lives
of many catastrophically injured workers.

Thank you for your dedication to advancing the field of
SCI care, education, research, and best practices.



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At MedStar National Rehabilitation Hospital, we treat the whole person with our advanced rehabilitation approaches, a wellness program with a variety of activities, and a state-of-the-science research program with opportunities throughout the spectrum of SCI.



DISCOVER-SCI – New interactive education portal is now available!

Current topics include:

1. What is SCI?
2. Neurogenic Bladder
3. Neurogenic Bowel
4. Skin Care and Wound Prevention
5. Autonomic Dysreflexia



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congratulates **ASIA**
on **50 years** of
outstanding service to
the SCI community.





2023 ANNUAL SCIENTIFIC MEETING

2023 Annual Scientific Meeting Chair

Christopher West, PhD
University of British Columbia, Vancouver, BC Canada

2023 Annual Scientific Meeting Vice Chair

Rajiv Saigal, MD, PhD
University of Washington, Seattle, WA

MONDAY, APRIL 17TH All Program times are in Eastern Time (ET)

TIME	WINDSOR BALLROOM	HOPE BALLROOM	TRIPPE BALLROOM
6:30 AM - 8:00 AM	Registration		
7:00 AM - 8:00 AM	Early Career Breakfast Breakfast with Partner & Exhibitors		
8:00 AM - 8:15 AM	Welcome/Opening Remarks  Suzanne Groah, MD, MSPH ASIA President Director – SCI Rehabilitation and Recovery Program at Medstar National Rehabilitation Hospital at Georgetown, Washington DC		
8:15 AM - 8:45 AM	Lifetime Achievement Award Presented by Indira Lanig, MD  Kenneth C. Parsons, MD Paradigm Medical Director ASIA Past President		
8:45 AM - 9:00 AM	FELLOW OF ASIA (FASIA) AWARD <div style="display: flex; justify-content: space-around; align-items: flex-end;"> <div style="text-align: center;">  Andy Blight, PhD </div> <div style="text-align: center;">  David R. Gater, MD, PhD, MS </div> <div style="text-align: center;">  Brian K. Kwon, MD, PhD, FRCSC </div> <div style="text-align: center;">  Janice Tilley </div> <div style="text-align: center;">  Eva Widerstrom-Noga, DDS, PhD </div> <div style="text-align: center;">  Kathy Zebracki, PhD </div> </div>		
9:00 AM - 9:45 AM	Sell Lecture: Regenerating the Injured Spinal Cord: From Molecules to Man  Elizabeth Bradbury, PhD King's College London U.K. ● Click Here for Abstract		
9:45 AM - 10:45 AM	Poster Session 1 (Listings page 28) ● Click Here for Abstracts		
9:45 AM - 10:45 AM	Break with Partners & Exhibitors		
10:45 AM - 11:30 AM	Exhibitor/Partner Recognition of our Generous Conference Supporters		
11:30 AM - 11:40 AM	Stretch Break/Transfer to Next Session		

continued

MONDAY, APRIL 17TH *All Program times are in Eastern Time (ET)*

TIME	WINDSOR BALLROOM	HOPE BALLROOM	TRIPPE BALLROOM
11:40 AM - 12:40 PM	<p>General Session 1 Ambulation, Copulation and Colonization Topics in SCI</p> <p>● Click Here for Abstracts</p>	<p>General Session 2 From Pediatrics & Pain to Prodding and Population Level Statistics</p> <p>● Click Here for Abstracts</p>	<p>Course 1 TRIP Closing the Loop: Next-Generation Epidural Stimulation and Neuroethical Lessons from the Past</p> <p>● Click Here for Abstract</p>
12:40 AM - 1:40 PM	<p>Lunch – Presentation Sponsored by ODC: How the Open Data Commons for Spinal Cord Injury Can Assist with Data Management and Sharing Mandates Karim Fouad, PhD • ODC Co-Director Dr. Abel Torres Espin • ODC Lead Data Scientist</p>		
1:40 PM - 1:50 PM	Stretch Break/Transfer to Next Session		
1:50 PM - 3:10 PM	<p>Course 2 Where to Start? Perspectives and Tools for Crafting a Meaningful Community for Engagement Program in SCI Research</p> <p>● Click Here for Abstract</p>	<p>Course 3 Operant Conditioning of Muscle-Evoked Potentials Enhancing Motor Function Recovery After Spinal Cord Injury</p> <p>● Click Here for Abstract</p>	<p>Course 4 TRIP Combinatorial Therapies for Functional Restoration Spinal Cord Injury (Presented by SCOPE)</p> <p>● Click Here for Abstract</p>
3:10 PM - 3:20 PM	Stretch Break/Transfer to Next Session		
3:20 PM - 4:40 PM	<p>Course 5 Developing a Strong Base for Athletes of Adaptive Sport: Keys to Keeping an Athlete’s Shoulders in the Game</p> <p>● Click Here for Abstract</p>	<p>Course 6 The Future of SCI Education: Advances, Priorities, and Challenges in the Next Decade</p> <p>● Click Here for Abstract</p>	<p>Course 7 TRIP Emerging Strategies to Treat Spasticity and Understand Its Role in Motor Control and Recovery After Spinal Cord Injury</p> <p>● Click Here for Abstract</p>
4:40 PM - 5:30 PM	Membership Meeting with Refreshments		

continued

DP Clinical Congratulates ASIA on 50 Years of Spinal Cord Injury Care, Education, and Research



If you're looking for a partner to help you conduct your next SCI clinical trial, DP Clinical has the expertise to ensure success.

Experience – With more than 28 years as a full-service contract research organization (CRO) provider specifically focused on SCI clinical research, we understand the challenges of SCI trials. We've been involved in SCI research from the beginning and managed the gold standard SCI trial, Sygen® (GM1). Our research experience includes SCI drugs, devices, neuromodulation, autologous and stem cells, and gene therapy and their associated efficacy assessments.

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To learn more, visit: ANEUVO.com/aspire-study



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*Chronic injury shall be defined as either (1) 12 months since initial injury or (2) a preceding six months of no significant change in motor function (<2.72 points in ISNCSCI Upper Extremity Motor Score).

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2023 ANNUAL SCIENTIFIC MEETING

TUESDAY, APRIL 18TH All Program times are in Eastern Time (ET)

TIME	WINDSOR BALLROOM	HOPE BALLROOM	TRIPPE BALLROOM
6:30 AM - 6:00 PM	Registration – Windsor Foyer		
7:00 AM - 7:45 AM	Breakfast with Partner & Exhibitors		
7:45 AM - 8:30 AM	Lectureship  Treating the Injured Spinal Cord: A Historical Review Karim Fouad, PhD Co-Director/Editor of the Open Data Commons-SCI University of Alberta		
8:30 AM - 9:40 AM	Awards-Eligible Oral Presentations – Moderator Steven W. Brose, DO <ul style="list-style-type: none"> • Motor Scores Prediction from Light Touch and Pin Prick Scores in the International Standards for Neurological Classification of Spinal Cord Injury (ISNCSCI) • Untreated Moderate-To-Severe Sleep-Related Breathing Disorders Is Correlated with Increased Number of Silent Episodes of Autonomic Dysreflexia During Sleep in Individuals Living with Subacute or Chronic Spinal Cord Injury: A Prospective Cross-Sectional Study • Loss Of Cortical Inhibition in Chronic Spinal Cord Injury: Clinical Implications for Sensorimotor Impairment, Functional Capability, And Self-Care Independence • Development of the Pediatric Appraisals of Disability Primary and Secondary Scale (Pedsadapss): Qualitative Methods • Healthcare Experiences Of LGBTQ+ Persons who Live with Spinal Cord Injury • NVG-291 Phase 1 Results and Phase 1b/2a Study Design in Individuals with Spinal Cord Injury <p>● Click Here for Abstracts</p>		
9:40 AM - 9:50 AM	Stretch Break/Transfer to Next Session		
9:50 AM - 10:40 AM	Multidisciplinary Management of Individuals with SCI and Neurogenic Bladder through Interactive Cases: Aligning with the Guidelines Rose Khavari, Md (Moderator) Argyrios Stampas, MD, MS Michael Kennelly, MD  Building a Bridge to Better Neurogenic Bladder Care		
10:40 AM - 11:40 AM	Posters Session 2 – Venetian Ballroom (Listings page 28) ● Click Here for Abstracts		
10:40 AM - 11:40 AM	Break with Exhibitors & Partners		
11:40 AM - 12:40 PM	General Session 3 Vessels, Vasoconstriction, and Ventilation ● Click Here for Abstracts	General Session 4 Topics in Acute Phase Clinical Research and Care ● Click Here for Abstracts	Course 8 TRIP Impaired Respiration and Infection Susceptibility After SCI ● Click Here for Abstract

continued

TUESDAY, APRIL 18TH All Program times are in Eastern Time (ET)

TIME	WINDSOR BALLROOM	HOPE BALLROOM	TRIPPE BALLROOM
12:40 PM - 1:40 PM	Individual Lunch Presentations by Spinex and ASIA  Noninvasive Spinal Neuromodulation: The Current Applications and the Future Opportunities 		
1:40 PM - 1:50 PM	Stretch Break/Transfer to Next Session		
1:50 PM - 3:10 PM	Course 9 Beyond ISNCSCI Considerations for Additional Profiling in SCI Clinical Trials Practices ● Click Here for Abstract	Course 10 Addressing The Priorities of Individuals with SCI: Spinal Cord Stimulation for Improving Sexual, Lower Urinary Tract, and Bowel Function Following Spinal Cord Injury ● Click Here for Abstract	Course 11 TRIP The Good, The Bad, and the Unknown: Is Stretching Beneficial or Detrimental After Spinal Cord Injury? ● Click Here for Abstract
3:10 PM - 3:20 PM	Stretch Break/Transfer to Next Session		
3:20 PM - 4:20 PM	General Session 5 Neuromodulation: Participant Perspectives, Public Perceptions, and Practical Applications ● Click Here for Abstracts	General Session 6 Barriers to Transcend in the Pursuit of Health and Wellness After SCI ● Click Here for Abstracts	Course 12 TRIP Tools of the Trade: Evaluating Strengths and Limitations of Cardiovascular Assessment ● Click Here for Abstract
4:20 PM - 4:40 PM	Refreshment Break with Partners & Exhibitors		
4:40 PM - 6:00 PM	Course 13 The Physiology and Function of Exercise: A Multidisciplinary Collaboration for Addressing Exercise, Activity and Wellness with Spinal Cord Injury ● Click Here for Abstract	Course 14 The State of Clinical Trials: Recent Observations from a Clinical Research Organization (CRO) Perspective and Implications for New Researchers and Research Programs ● Click Here for Abstract	Course 15 TRIP Physiological Targets of Therapeutic Acute Intermittent Hypoxia ● Click Here for Abstract
6:30 PM - 8:30 PM	 Presidents Reception: Celebrating 50 Years Hosted by Suzanne Groah, MD, MSPH The Garden, Intercontinental Hotel Buckhead 		





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2023 ANNUAL SCIENTIFIC MEETING

WEDNESDAY, APRIL 19TH *All Program times are in Eastern Time (ET)*

TIME	WINDSOR BALLROOM	HOPE BALLROOM	TRIPPE BALLROOM
6:30 AM - 6:00 PM	Registration		
7:00 AM - 8:00 AM	Breakfast		
8:00 AM - 9:00 AM	Awards Session <ul style="list-style-type: none"> • Neilsen Foundation Allied Health Professional Research Award of ASIA • Apple Award • Vogel Award • Mulcahey Award • TRoHNS Award • Top 3 Oral Talk Awards • Top 3 Poster Awards • Early Career Awards 		
9:00 AM - 9:10 AM	Stretch Break/Transfer to Next Session		
9:10 AM - 10:30 AM	Course 16 Management of Male Sexual Dysfunction and Infertility After Spinal Cord Injury (SCI) ● Click Here for Abstract	Course 17 SCI-ENce: Matching the Arrows of ENgineering to the Targets of SCI Medicine ● Click Here for Abstract	Course 18 TRIP Neurogenic Obesity and Metabolic Dysfunction After Spinal Cord Injury: Translating Observations from Bedside to Bench ● Click Here for Abstract
10:30 AM - 10:45 AM	Stretch Break/Transfer to Next Session		
10:45 AM - 11:45 AM	General Session 7 A Tour de Force of the System Wide Impacts of SCI ● Click Here for Abstracts	General Session 8 The Lived Experience: Health, Heatwaves, and Haute Couture ● Click Here for Abstracts	Course 19 TRIP What AI and Data Science Can Tell Us About SCI ● Click Here for Abstract
11:45 AM - 11:55 AM	Stretch Break/Transfer to Next Session		
11:55 AM - 12:55 PM	Course 20 Addressing Suicide Risk Among Patients with Catastrophic Injury and Neurological Illness ● Click Here for Abstract	Course 21 Leadership Skills in the Digital Age: Leveraging Social Media for Dissemination to People with Spinal Cord Injury and Study Recruitment ● Click Here for Abstract	Course 22 TRIP Enhancing Recovery After Spinal Cord Injury with Closed-loop Vagus Nerve Stimulation ● Click Here for Abstract
12:55 PM - 1:00 PM	Conclusion		

NEW!

UROLOGY

in the ASIA Learning Center

1. Anatomy & Physiology Neurogenic Dysfunction
2. Testing Imaging Long Term Follow-up
3. Mechanical Methods of Bladder Mgmt.
4. Pharmacological Methods of Bladder Mgmt.
5. Surgical Treatments for Bladder Mgmt.
6. Urinary Tract Infections in Persons with SCI
7. Urological Complications Following SCI
8. Neurogenic Bladder in the Pediatric Population

*Thank you to the ASIA Education
subcommittee on Urology*



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2023 ANNUAL SCIENTIFIC MEETING COURSES

MONDAY, APRIL 17TH, CONTINUED

Course	Moderator	Presenters
COURSE 1 TRIP Closing the Loop: Next-Generation Epidural Stimulation and Neuroethical Lessons from the Past	Ryan Solinsky, MD	David Borton, PhD Jonathan Calvert, PhD Lauren Sankary, JD
COURSE 2 Where to Start? Perspectives and Tools for Crafting a Meaningful Community Engagement Program In SCI Research	Jennifer French, MBA	Kim Anderson-Erisman, PhD Cheryl Vines Melissa Miller, PhD John Chernesky
COURSE 3 Operant Conditioning of Muscle-Evoked Potentials for Enhancing Motor Function Recovery After Spinal Cord Injury	Aiko Thompson, PhD	Sue Ann Sisto, PT, MA, PhD, FACRM Blair H.S. Dellenbach, MSOT Isaac P. Clements, PhD
COURSE 4 TRIP Combinatorial Therapies for Functional Restoration after Spinal Cord Injury (presented by SCOPE)	Monica Perez, PT, PhD	Linda Jones, PT, PhD Gordon Mitchell, B.S, PhD Martin Oudega, PhD
COURSE 5 Developing a Strong Base for Athletes of Adaptive Sport: Keys to Keeping an Athlete's Shoulders in the Game	Meegan Van Straaten, PhD, MSPH	Shanterian King, DO Robert Pagan Rosado, M Stephanie Lopez, DPT, PT, ATC
COURSE 6 The Future of SCI Education: Advances, Priorities, and Challenges in the Next Decade	Ronald Reeves, MD	Brittany Snider, DO Steffen Franz, MD Megan Torrance, MBA Steven Jackson, MD, MBA Jeanne Zanca, MPT, PhD
COURSE 7 TRIP Emerging Strategies to Treat Spasticity and Understand Its Role In Motor Control and Recovery After Spinal Cord Injury	Kajana Satkunendrarajah, PhD	Frédéric Brocard, PhD, HDR Carmelo Bellardita, PhD Monica Perez, PT, PhD

continued

COURSES

TUESDAY, APRIL 18TH, CONTINUED

Course	Moderator	Presenters
COURSE 8 TRIP Impaired Respiration and Infection Susceptibility after SCI	Angela Filous, PhD	Philippa Warren, PhD Warren Alilain, PhD Marcel Kopp, MD
COURSE 9 Beyond ISNCSCI: Considerations for Additional Profiling in SCI Clinical Trials	Keith Tansey, MD, PhD, FASNR, FASIA	Steve Kirshblum, MD James Guest, MD, PhD, FACS, FASIA
COURSE 10 Addressing The Priorities of Individuals with Spinal Cord Injury: Spinal Cord Stimulation for Improving Sexual, Lower Urinary Tract, and Bowel Function Following Spinal Cord Injury	Claire Shackleton, PhD	Stacy Elliott, MD, FASIA Raza Malik, PhD Tiev Miller, PhD
COURSE 11 TRIP The Good, The Bad, and the Unknown: Is Stretching Beneficial or Detrimental After Spinal Cord Injury?	Edelle Field-Fote, PT, PhD, FAPTA, FASIA	Emily Fox, DPT, MHS, PhD David Magnuson, PhD Anastasia Zarkou, PT, PhD
COURSE 12 TRIP Tools of the Trade: Evaluating Strengths and Limitations of Cardiovascular Assessment Practices	Soshi Samejima	Andrei V. Krassioukov, PhD, MD, FRCPC Tamila Kalimullina, BSc Shane Balthazaar, PhD, RDCS, FASE
COURSE 13 The Physiology and Function of Exercise: A multidisciplinary Colaboration for Addressing Exercise, Activity and Wellness with Spinal Cord injury	Lisa Ruppert, MD	Erin Prentice OT Nina Tamaya DO Kristin Gustafson DO Marissa Malady OT
COURSE 14 The State of Clinical Trials: Recent Observations from a Clinical Research Organization (CRO) Perspective and Implications for New Researchers and Research Programs	Isa McClure PT, MAPT 	Jim Hamer, BS Keith Tansey, MD, PhD, FASNR, FASIA
COURSE 15 TRIP Physiological Targets of Therapeutic Acute Intermittent Hypoxia	Gordon Mitchell, PhD	Emily Fox, PT, PhD Elisa Gonzalez-Rothi, PT, PhD Christopher West, PhD Randy Trumbower, PT, PhD

continued



Thank You!

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COURSES

WEDNESDAY, APRIL 19TH

Course	Moderator	Presenters
COURSE 16 Management of Male Sexual Dysfunction and Infertility After Spinal Cord Injury (SCI)	Emad Ibrahim, MD, HCLD	Emad Ibrahim, MD, HCLD Stacy Elliott, MD
COURSE 17 SCI-ENce: Matching the Arrows of Engineering to the Targets of SCI Medicine	Dennis Bourbeau,	Keith Tansey, MD, PhD, FASNRR, FASIA Quentin Sanders, PhD R James Cotton, MD, PhD Philip Requejo, PhD
COURSE 18 TRIP Neurogenic Obesity and Metabolic Dysfunction after Spinal Cord Injury: Translating Observations from Bedside to Bench	Gary Farkas, PhD	Cedric Geoffroy, PhD Jae Lee, PhD
COURSE 19 TRIP What AI and Data Science Can Tell Us About SCI	Abel Torres Espin, PhD	Catherine Jutzeler, PhD Nader Fallah, PhD Russell Huie, PhD
COURSE 20 Addressing Suicide Risk Among Patients with Catastrophic Injury and Neurological Illness	Jacqueline Baron-Lee, PhD	Laurie Baker, PhD Michael Yochelson, MD
COURSE 21 Leadership Skills in the Digital Age: Leveraging Social Media for Dissemination to People with Spinal Cord Injury and Study Recruitment	Jennifer Coker, PhD, MPH	David W McMillan, PhD Amanda Rounds, PhD Cody Unser, MPH
Course 22 TRIP Enhancing Recovery after Spinal Cord Injury with Closed-loop Vagus Nerve Stimulation	Chad Swank	Rita Hamilton, DO Rob Rennaker, PhD Jane Wigginton, MD

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Years

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AMERICAN SPINAL INJURY ASSOCIATION





2023 ANNUAL SCIENTIFIC MEETING

GENERAL SESSIONS

AWARDS-ELIGIBLE ORAL PRESENTATIONS

TUESDAY, APRIL 18TH ❖ 8:30 AM - 9:40 AM

Moderator: Steven W. Brose, DO

Oral Presentations	Presenters
Motor Scores Prediction from Light Touch and Pin Prick Scores in the International Standards for Neurological Classification of Spinal Cord Injury (ISNCSCI)	Christian Schuld, Msc
Untreated Moderate-To-Severe Sleep-Related Breathing Disorders is Correlated with Increased Number of Silent Episodes of Autonomic Dysreflexia During Sleep in Individuals Living with Subacute or Chronic Spinal Cord Injury: A Prospective Cross-Sectional Study	Julio Furlan, MD, LLB, MBA, PhD, MSc, FRCPC, FAAN
Loss Of Cortical Inhibition in Chronic Spinal Cord Injury: Clinical Implications for Sensorimotor Impairment, Functional Capability, And Self-Care Independence	Jia Liu, PhD
Development of the Pediatric Appraisals of Disability Primary and Secondary Scale (Pedsadapss): Qualitative Methods	Kyle Deane, PhD
Healthcare Experiences of LGBTQ+ Persons Who Live with Spinal Cord Injury	Jenny Kiratli, PhD
NVG-291 Phase 1 Results and Phase 1b/2a Study Design in Individuals with Spinal Cord Injury	Daniel Mikol, MD, PhD

continued



GENERAL SESSIONS

MONDAY, APRIL 17TH, CONTINUED

Oral Presentations	Presenters
<p>11:25 AM - 12:25 PM ❖ Moderator: Matheus Wiest, PhD General Session 1: Ambulation, Copulation and Colonization Topics In SCI</p>	
Safety, Feasibility, and Usability of The ABLE Lower-Limb Robotic Exoskeleton for Individuals with SCI – Results of a European Multicenter Study	Rüdiger Rupp, PhD
Using Classification Trees to Assist Clinicians in Establishing Nuanced Prognosis of Walking Outcomes Following Traumatic Spinal Cord Injury: A Population-Based Study	Antoine Dionne, MD, MSc
The Convergent Validity of the Standing and Walking Assessment Tool (SWAT) Among Individuals with Non-Traumatic Incomplete Spinal Cord Injury: The Spinal Cord Injury Implementation and Evaluation Quality Care Consortium Experience	Cathy Craven MD, MSc, FRCPC, FASIA
Let’s Talk About Sex: Male Sexual Dysfunction and Spinal Cord Stimulation Following Spinal Cord Injury	Claire Shackleton, PhD
Pregnancy Outcomes in Women with Spinal Cord Injuries: A Population-Based Study	Deborah Crane, MD, MPH
The Microbiological Burden of Short-Term Catheter Reuse in Individuals with Spinal Cord Injury: A Prospective Clinical Trial	Tiev Miller, PhD
<p>11:25 AM - 12:25 PM ❖ Moderator: John Kramer, PhD General Session 2: From Pediatrics & Pain to Prodding and Population Level Statistics</p>	
The International SCI Pain Basic Data Set Version 3.0	Eva Widerstrom-Noga, DDS, PhD
Challenges In the Classification of Central Cord Syndrome	Einat Engel-Haber, MD BSc
Transcranial Magnetic Stimulation Assessment in Patients with Subacute Spinal Cord Injury During Inpatient Rehabilitation	Hui-Ting Shih, PT, PhD
Patterns Of Cannabis and Cannabinoid Use Among People with Chronic SCI: Results from A Cross-Sectional Study	Jennifer Coker, PhD, MPH
Pediatric Traumatic Spinal Cord Injury in the United States: A 2019 Nationwide Readmission Analysis	James Crispo, MSc, PhD
The Effects of Concomitant Traumatic Brain Injury (TBI) on the Epidemiology of Spinal Cord Injury (SCI), Access to Treatment Services, and Outcomes After Acute Traumatic SCI: A Propensity-Score Matched Cohort Study Using Data from a Canadian National Registry	Julio Furlan, MD, LLB, MBA, PhD, MSc, FRCPC, FAAN

continued



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²Positive topline observations from LIFT Home Study with ARC^{EX} Therapy

³Interim outcomes from ARC^{IM} studies show improvement in blood pressure regulation and quality of life for people with SCI-related orthostatic hypotension

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2023 ANNUAL SCIENTIFIC MEETING

GENERAL SESSIONS

TUESDAY, APRIL 18TH, CONTINUED

Oral Presentations	Presenters
11:40 AM - 12:40 PM ♦ Moderator: Shane Balthazaar, PhD General Session 3: Vessels, Vasoconstriction, and Ventilation	
Adjuvant Ethyl Nitrite as A Novel Neuroprotective Approach to Hemodynamic Management Following SCI	Ryan Hoiland, PhD
Item Banks for Measuring the Impact of Blood Pressure Dysregulation on Health-Related Quality of Life in Persons with Spinal Cord Injury	Jill Wecht, EdD
Vascular Spinal Cord Dysfunction Etiologies and Outcomes 1995-2020	Melanie White, DO, PGY-3
Elucidating Sympathetic Vasoconstrictor Mechanisms of Autonomic Dysreflexia in Persons with Spinal Cord Injury	Michelle Trbovich, MD
Noninvasive Spinal Neuromodulation Mitigates Orthostatic Hypotension Following Spinal Cord Injury: Translational Evidence	Rahul Sachdeva, PhD
Treating Sleep-Related Breathing Disorders with CPAP Therapy for 4 Months Can Improve Sleep Quality and Daytime Alertness, Fatigue, and Mental Health in People with Chronic Spinal Cord Injury: An Update on an Ongoing Study Using Mixed Methods	Julio Furlan, MD, LLB, MBA, PhD, MSc, FRCPC, FAAN
11:40 AM - 12:40 PM ♦ Moderator: Rajiv Saigal, MD, PhD, FAANS General Session 4: Topics in Acute Phase Clinical Research and Care	
Predicting Subacute Motor Recovery in Tetraplegia by Early Assessment of Subclinical Voluntary Motor Unit Action Potentials and Stimulated Manual Motor Testing	James Wilson, DO
The Importance of Tracheostomy Management in Cervical Spinal Cord Injured Patients and the Role of Diaphragm Pacing in a Systems Approach	Raymond Onders, MD
Risk and Protective Factors for Emergency Department Visits and Related Hospitalizations Among Ambulatory Adults with Traumatic Spinal Cord Injury	Nicole DiPiro, PhD
NX210c Peptide Promotes Functional Recovery and Repair in a Rat Cervical Clip-Compression Model of Spinal Cord Injury	Sighild Lemarchant
An Electromyographic Method of Hoffman Reflex Assessment Adapted for Hospitalized and Acute Spinal Cord Injury Patients to Study its Evolution During the Spinal Shock Period	Christina-Maria Maalouf
Challenges And Barriers to Performing Activity-Based Therapy During the First 2 Weeks Following Traumatic Spinal Cord Injury	Antoine Dionne, MD, MSc

continued

GENERAL SESSIONS

TUESDAY, APRIL 18TH, CONTINUED

Oral Presentations	Presenters
3:20 PM - 4:20 PM ❖ Moderator: Lisa A. Beck MS, APRN, CNS, CRRN General Session 5: Neuromodulation: Participant Perspectives, Public Perceptions, and Practical Applications	
Proof-of-Concept: A Hands-Free Interface for Robot-Assisted Self-Feeding	John Schultz
Shaping Public Perception of Spinal Cord Stimulation: A Scoping Review of Publicly Accessible Web-Based Information	Tiev Miller, PhD
Translation of a Wearable, Non-Invasive Stimulation Device to Treat Incontinence in People with Neurogenic Bladder	Seth Meade, BSE
Spinal Cord Mapping for Pelvic Organ Function Using Non-Invasive Spinal Neuromodulation	Raza Malik, Postdoctoral Fellow
Non-invasive Spinal Neuromodulation for Bowel and Lower Urinary Tract Functions	Soshi Samejima, DPT, PhD
Importance and Feasibility of Measuring Different Biomarkers to Profile Participants and Detect Treatment Effects in SCI Neuromodulation Studies	Keith Tansey, MD, PhD, FASIA
3:20 PM - 4:20 PM ❖ Moderator: Camilo Castillo, MD, MBA General Session 6: Barriers to Transcend in the Pursuit of Health and Wellness After SCI	
Main Barriers for Practicing Adapted Sports in Latin America from the Perspective of the Provider Caring for Individuals with a Spinal Cord Injury	Isaac Hernandez Jimenez, MD
The Implementation of National Telehealth Services in Spinal Cord Injury	Candace Tefertiller PT, DPT, PhD, NCS
Spinal Cord Injury Research Participant’s Views on Data Sharing	Freda Warner, Dr
Co-Creating Theory – And Evidence-Based Training Modules on Best Practices for Physical Activity Counseling for Adults with Spinal Cord Injury	Femke Hoekstra, PhD
When Both the Destination and Journey Are Important: Ideal Care Pathways for Traumatic Spinal Cord Injury in Ontario	Matheus Wiest, PhD
A Mixed Methods Approach to Evaluating the Feasibility and Acceptability of a Brief Motivational Intervention to Improve Health Behaviors	Alicia January, PhD

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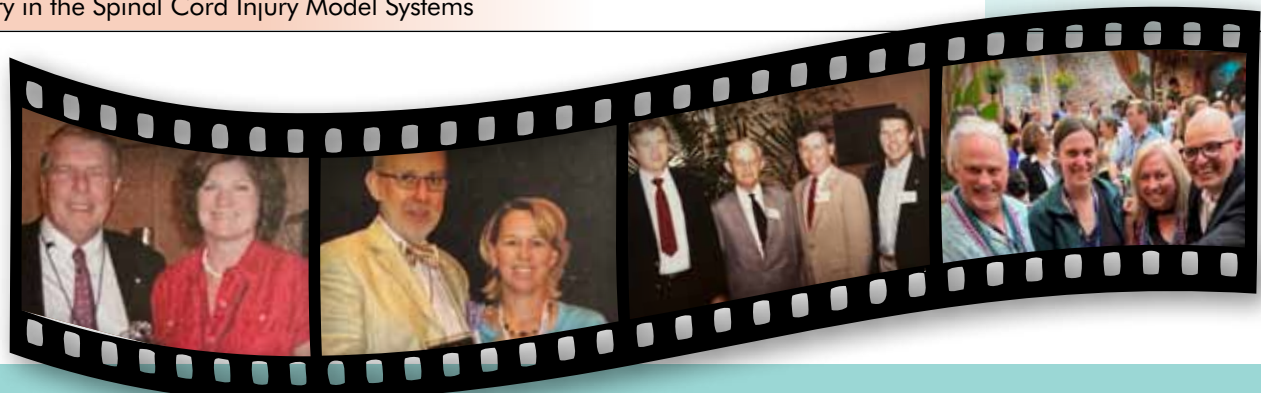


2023 ANNUAL SCIENTIFIC MEETING

GENERAL SESSIONS

WEDNESDAY, APRIL 19TH

Oral Presentations	Presenters
10:40 AM - 11:40 AM ❖ Moderator: Isa McClure, PT, MAPT General Session 7: A Tour de Force of the System Wide Impacts of SCI	
Sensory Cortical-Locomotor Pathway Restores Walking After Spinal Cord Injury	Kajana Satkunendrarajah, PhD
Comparing Heart Rate Variability Biofeedback Training and Meditation Relaxation Techniques for Pain Management in Individuals with Paraplegia from Spinal Cord Injury: A Pilot Study	Lisa Haubert, MPT, DPT, KEMG
Total Energy Intake Prediction Equations Overestimate Relative to Actual Intake in Spinal Cord Injury	Gary Farkas, PhD
Cardiometabolic Risk Calculations in Spinal Cord Injury/Disorders: Results of an Exploratory Analysis	Khin Chan, MBBS, MS
The Overreaction of the Immune Response After Spinal Cord Injury and Methods to Reduce Inflammation	Daniel Hellenbrand, MS
10:40 AM - 11:40 AM ❖ Moderator: Indira Lanig, MD General Session 8: The Lived Experience: Health, Heatwaves, and Haute Couture	
Climate and Healthcare Access: Understanding the (In) Equitable Influence of Extreme Weather Events on Spinal Cord Injured Individuals in Miami, Florida	Daniel Samano, MD, MPH, MSCHc
Social Participation as a Mediator of the Relationships of Socioeconomic Factors and Longevity After Traumatic Spinal Cord Injury	Yue Cao, PhD
Young Adult Programming	Tayla Mangus, MS, OTR/L Lindsay Brinker, PT, DPT
Fashionable: Current Practices and Barriers to Adaptive Clothing Among Individuals with Spinal Cord Injury	Nicole Banting
Fashionable: Perspectives on Functional and Fashion-Friendly Adaptive Clothing Among Individuals with Spinal Cord Injury	Bianca Magdangal
Complementary and Integrative Healthcare Coverage for People with Spinal Cord Injury in the Spinal Cord Injury Model Systems	Bria MacIntyre, MS



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2023 ANNUAL SCIENTIFIC MEETING

POSTERS

AWARDS-ELIGIBLE POSTERS

- 1** FashionABLE: Health Care Practitioners' Perspectives on Adaptive Clothing After Spinal Cord Injury
❖ *Tamila Kalimullina, BSc*
- 2** Work-Related Spinal Cord Injury (SCI): Does Race/Ethnicity Matter?
❖ *Huacong Wen, PhD*
- 3** Effects of Midodrine Administration Over a 30-Day Period Compared to Placebo, on Blood Pressure and Cerebral Blood Flow Velocity and Cognitive Performance in Persons with SCI
❖ *Caitlyn Peters, PhD*
- 4** The Gut Microbiome After SCI: A Preliminary Analysis of Bacterial Quorum Sensing Molecules to Identify Molecular Mechanisms of GI Dysfunction
❖ *Mark Nash, PhD, FACS, FASIA*
- 5** Feasibility Study of Smart Seat Cushion for Automated Interface Pressure Modulation
❖ *Aida Nasirian, Research Scientist II*
- 6** Comparative Efficacy of Four Different Transcranial Current Stimulation Modalities and Montages for Enhancing Corticospinal Excitability and Improving Upper Extremity Functional Restoration in Persons with Tetraplegia
❖ *Jennifer Iddings, PhD*
- 7** Effects of Lumbosacral Spinal Cord Epidural Stimulation on Plasma Catecholamine Concentrations During Orthostatic Stress in Individuals with Chronic Spinal Cord Injury
❖ *Siqi Wang, PhD*
- 8** Multi-session Application of Transcranial Random Noise Stimulation to Improve Hand Function in Persons with SCI
❖ *Anastasia Zarkou, PT, MS, PhD*
- 9** Alterations of Visual Cortex in Chronic Adult SCI: The Underpinnings of the Resting State BOLD fMRI
❖ *Laura Krisa, PhD*
- 10** American Spinal Injury Association (ASIA) Impairment Scale (AIS) Conversion Underestimates Neurological Recovery Following Traumatic Spinal Cord Injury
❖ *Winward Choy, MD*

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2023 ANNUAL SCIENTIFIC MEETING POSTERS

ACUTE CARE

- 11** Exploratory Analyses of Factors Associated with Discharge Home after Acute SCI Inpatient Rehabilitation
❖ *Benjamin Dirlikov*
- 12** A Pilot Survey Identifying Gaps in Spinal Cord Injury Intervention in Post-Acute Settings: A Therapist's Perspective
❖ *Rebecca Hutton, OTS*
- 13** Metabolite's Role in Bio-Fluids as A Prognostic Indicator of Neurological Recovery In Acute Spinal Cord Injury (ASCI)
❖ *Alka Singh, Dr.*

BOWEL/BLADDER

- 14** Changing Bowel Pattern in Young Man with Chronic Paraplegia and Neurogenic Bowel: A Case Report
❖ *Kaila Yeste, DO*
- 15** Can Urinalysis or Urine Culture Describe a "Pre-Symptomatic" State in People with Neurogenic Lower Urinary Tract Dysfunction Who Use Intermittent Catheterization?
❖ *Allison Maxwell, BA*
- 17** The Temporal Burden Associated with Preparing Catheters for Reuse Among People with Spinal Cord Injury: A Cross-Sectional Study
❖ *Liza Roik*

CARDIOVASCULAR

- 18** May I Have This Dance: A Case-Series on the Acute Cardiometabolic Demand and Psychosocial Effects of Wheelchair Dancing in Recreational Para-Dancers with Spinal Cord Injury
❖ *Tiev Miller, PhD*
- 20** Risk of Ischemic Heart Disease Readmission After Traumatic Spinal Cord Injury
❖ *Analisa Jia, MSc*
- 21** Vascular Spinal Cord Dysfunction Survival Analysis and Hazard Ratio 1995-2020
❖ *Melanie White, DO, PGY-3*

DATASETS

- 22** Breastfeeding for Mothers with Spinal Cord Injury: A Narrative Review on the Quality and Availability of Current Guidelines
❖ *Tiev Miller, PhD*
- 23** Retrospective Analysis of the Treatment of BPPV in Persons with Sub-Acute Spinal Cord Injury
❖ *Ryan Koter, PT, DPT*
- 24** Differences in Personal Characteristics, Emergency Department Utilization, and Hospitalizations Among Ambulatory and Non-Ambulatory Adults with Traumatic Spinal Cord Injury
❖ *Nicole DiPiro, PhD*
- 25** Utilization of Machine Learning Techniques in Prediction of Hospital Readmission During One Year Post Spinal Cord Injury
❖ *Salma Aly, MD*
- 26** The Influence of Concomitant Traumatic Brain Injury on The Survival, and Neurological and Functional Recovery After Acute Traumatic Spinal Cord Injury: A Retrospective Cohort Study Using Data from the NASCIS-3 Trial
❖ *Julio Furlan, MD, LLB, MBA, PhD, Msc, FRCPC, FAAN*
- 27** The State of Spinal Cord Injury Rehabilitation in Youth in Latin America
❖ *Isaac Hernandez Jimenez, MD*
- 28** Wheelchair Rugby Participation in Spinal Cord Injury Individuals in Argentina
❖ *Isaac Hernandez Jimenez, MD*

EXERCISE

- 29** Preliminary Findings for a Sequential Multiple Assignment Randomized Trial (SMART) to Increase Adherence to Home Exercise in People with Spinal Cord Injury
❖ *Jereme Wilroy, PhD*
- 30** 3 Months of Blood Flow Restriction Training Improves Gait Capacity in Chronic Incomplete Spinal Cord Injury
❖ *Jane Alkhazov, PT, DPT*
- 31** Integrating Activity-Based Therapy into Subacute Spinal Cord Injury Rehabilitation
❖ *Catherine Farrell, PT, NCS*
- 32** Spinal Cord Injury Enrollment Experiences in Studies Using Overground Exoskeleton Gait Training During Inpatient Rehabilitation
❖ *Faith Meza, MPH, CPH*

continued

POSTERS

IMAGING

- 33** Cortical Areas of Activation Following the ISNCSCI Test of Injury Completeness: a Pediatric fMRI Study
❖ *Laura Krisa, PhD*
- 34** Perturbations of BOLD fMRI Signal of Human Occipito-Temporal Visual Cortex in Chronic Pediatric SCI Population
❖ *Laura Krisa, PhD*

STANDARDS

- 36** Feasibility of Conducting the International Standards to Document Autonomic Function Following Spinal Cord Injury (ISAFSCI) in Newly Injured Patients with SCI
❖ *Ivani Proano, MBS*

MEASUREMENT & EVALUATION TOOLS

- 38** Ultrasound Evaluation of Intralesional Muscle Integrity Following Cervical Spinal Cord Injury
❖ *Hannah Ro, Fourth-Year Undergraduate Student*
- 39** Setting Up a Platelet-Rich Plasma Protocol for Pressure Injury Management in a Spinal Cord Injury/Disorder Unit
❖ *Kevin Suarez, MD*
- 40** Wearable Sensors to Measure Shoulder Motion in the Free-Living Environment in Wheelchair Users with SCI: Technical Challenges and Recommendations
❖ *Melissa Morrow, PhD*
- 41** Measurement of Magnetization Transfer Ratio in Typically Developed Pediatric Spinal Cord: Clinical Feasibility, Assessment of Normative Data, and Age Correlation
❖ *Laura Krisa, PhD*
- 42** Increasing Falls and Alcohol: Changes in the Etiology of Traumatic Spinal Cord Injuries in the Upper Midwest United States
❖ *Ben Johnson, N/A*
- 43** Ultrasound Evaluation of Diaphragm Function in Patients with SCI: Lessons Learned, Future Directions
❖ *Philippines Cabahug, MD*

NEUROMODULATION

- 44** A Brain-Computer Interface Neuromodulation Intervention to Reduce Neuropathic Pain After Spinal Cord Injury
❖ *Negin Hesam-Shariati, PhD*
- 45** Implantable Health Monitoring for Spinal Cord Injury
❖ *Kevin Kilgore, PhD*

- 46** Axial Damage Ratio May Relate to Standing Performance Following Percutaneous Epidural Stimulation in Persons with Spinal Cord Injury
❖ *Ahmad Alazzam, B.S.*
- 47** Effects of Transcutaneous Spinal Stimulation Versus Whole Body Vibration on Quadriceps Spasticity in Persons with Spinal Cord Injury
❖ *Evan Sandler, PT, DPT*
- 48** Quantifying Neuromodulation in Persons with SCI: A Comparison of Modulatory Responses to Low-Frequency Depression Versus Paired-Pulse Stimulation
❖ *Charles Creech, PT, DPT*
- 49** Optimizing Transcutaneous Spinal Stimulation Through Efficient Assessment of Posterior Root Muscle Reflex Excitability
❖ *Oliver Daliet IV, MS*
- 50** Optimizing Deep Brain Stimulation of the Midbrain Locomotor Region for Gait Control After Incomplete Spinal Cord Injury in a Translational Large Animal Model
❖ *Brian Noga, PhD*
- 51** Single Lead Midline Epidural Stimulation Immediately Restored Trunk Control and Standing in a Person with Complete Paraplegia
❖ *Ashraf Gorgey*
- 52** Utilizing Neuromodulation in the Treatment of Spinal Cord Injury: An Assessment of Clinical Trials from the National Clinicaltrials. Gov Database
❖ *Moshe Shalom, Medical Student*

PRESSURE INJURY

- 53** Effects of Repositioning Angle on Interface Pressure Using Automated Bed in Spinal Cord Injury Patients
❖ *Onyoo Kim, MD*
- 54** Community Evaluation of a Novel Real-Time Pressure Sensing and Pressure Relief Activity Feedback System for Manual Wheelchair Users with Spinal Cord Injury: A Focus Group Analysis
❖ *Jack Janett, B.S. Human Biology*
- 55** Measuring Pressure Within Pressure Ulcers - A Biomechanical Approach
❖ *Gregory Dimas, MD*
- 56** Evaluating Independent In-Bed Mobility During Sleep After Acute Spinal Cord Injury to Assess the Risk of Pressure Injuries
❖ *Jean-Marc Mac-Thiong, MD, PhD*

continued

POSTERS

PSYCHOSOCIAL

- 57** Implementation of a Formal Education Program for Caregivers and Youth with SCI/D
❖ *Kristen Wagner, PT, DPT*
- 58** Positive Psychosocial Changes Relating to Physical Activity Behavior After Participation in a Group Tele-Exercise Program for Individuals with SCI
❖ *Laura Baehr, PT, DPT, PhD(c) (defense 2/2023)*
- 59** Physical and Psychosocial Features of Exercisers vs. Non-Exercisers with SCI Enrolled in a Group Tele-Exercise Program
❖ *Laura Baehr, PT, DPT, PhD(c) (defense 2/2023)*
- 60** Pain and Life Satisfaction: The Role of Emotional Support and Social Participation in Adults with Pediatric-Onset Spinal Cord Injury
❖ *Alison Oh, MS*
- 61** Frequency of Employment and Factors Related to Labor Activity Inclusion in Patients with Spinal Cord Injury at the National Institute of Rehabilitation in Mexico
❖ *Karla Zarco Ordóñez, MD*
- 62** Problem Solving and Collaborative Involvement Among Adolescents with Spinal Cord Injury and their Caregivers
❖ *Olivia Clark, MA*
- 63** Developing a Community-Based Peer-Mentoring Program for Adolescents and Young Adults After Spinal Cord or Brain Injury
❖ *Shari McDowell, PT, DPT*
- 64** Recruitment Challenges in a Tele-Psychology Intervention for Persons with Spinal Cord Injury
❖ *Cria-May Khong, BS*

QUALITY OF LIFE

- 66** A Lifestyle Intervention Trial Targeting Enhanced Health and Function for Persons with Chronic SCI in Caregiver/Care-Receiver Relationships
❖ *Gregory Bigford, PhD MSBA*
- 67** Lifestyle Intervention for Caregiver/Care-Receiver Dyads in Chronic Spinal Cord Injury
❖ *Gregory Bigford, PhD MSBA*
- 68** SPINE: Specialized Progression of Independence and Wellness for Adolescents with a Spinal Cord Injury
❖ *Caitlin Jones, PT, DPT, Board-Certified Clinical Specialist in Neurologic Physical Therapy*

- 69** Satisfaction With Life In Patients With Spinal Cord Injury at the National Rehabilitation Institute "Luis Guillermo Ibarra Ibarra" in the Period 2015-2020
❖ *Bryant Martinez, MD*
- 70** Changes In Employment, Health, Participation, and Quality-Of-Life and the Relationships with Survival After Spinal Cord Injury
❖ *Yue Cao, PhD*

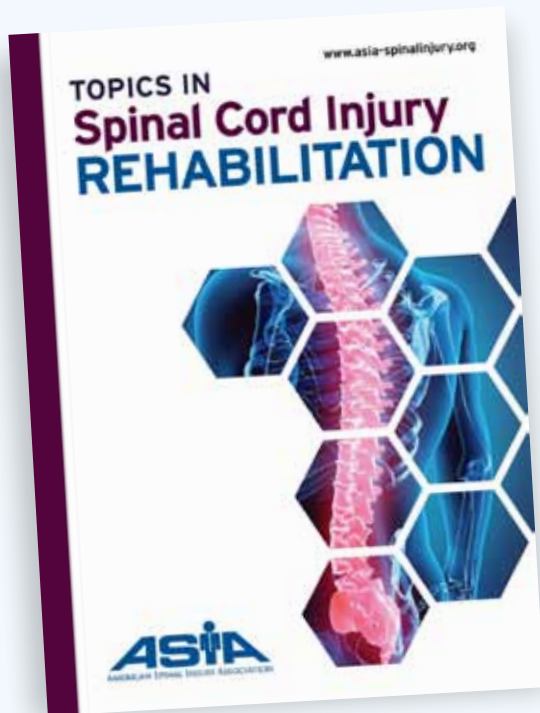
VIRTUAL TECHNOLOGY

- 71** Enjoyment of Gamified Electromyographic Biofeedback Therapy for People with an Incomplete Spinal Cord: A Pilot Study
❖ *Benjamin Petrie, MD*
- 72** Virtual Outings: Merging Technology and Community Training
❖ *Shari McDowell, PT, DPT*

SENSORY/MOTOR FUNCTION

- 73** Restoring Upright Posture Using Wheelchair Mounted Buttons
❖ *Kevin Foglyano, BSE*
- 74** Correlation Between Muscle Mass and Function in Individuals with Long Standing Spinal Cord Related Paralysis
❖ *Shannon Inches, Marjorie Morgan*
- 75** Denervation Impacts Muscle Quality and Knee Bone Mineral Density Compared to Upper Motor Neuron Injury After Spinal Cord Injury
❖ *Ahmad Alazzam, B.S.*
- 76** Neurophysiological and Functional Changes After Motor-Evoked Potential Operant Conditioning in Upper Extremity Muscles in Individuals with Spinal Cord Injury: A Case Series
❖ *Blair Dellenbach, MSOT*
- 77** Ziconotide for Spinal Cord Injury-Related Pain and Motor and Sensation Recovery
❖ *David Ho, DO*
- 78** Personalized Fitting of a K5 Wheelchair Positively Affects Posture and Upper Extremity Mechanics During Manual Wheelchair Propulsion in the Community
❖ *Philip Requejo, PhD*
- 79** Long Duration, Low-Concentration Topical Capsaicin Diminishes the Development of Central Sensitization
❖ *Lukas Linde, PhD*

continued



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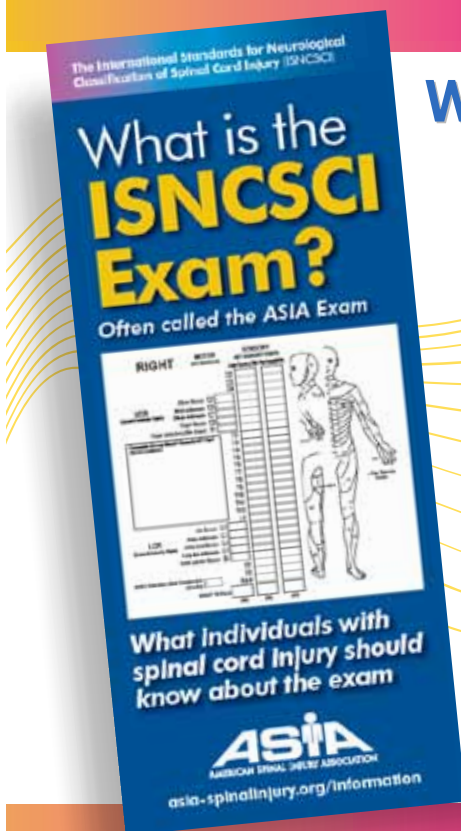
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POSTERS

SPASTICITY

- 80** Intrathecal Baclofen Drug Delivery Interference by Iphone Magnet
❖ Michelle Trbovich, MD
- 81** Development of a Standardized Weaning Protocol for Intrathecal Baclofen Pump Removal Due to Pump Infection
❖ Marla Petriello, DO
- 82** Leg Stretching Using a Robotic Leg Exoskeleton in People with Spasticity
❖ Naciye Bilgin Badur

NON-TRAUMATIC INJURY

- 83** A Rare Case of Horner Syndrome after Post Operatory Anterior Cervical Laminectomy in a Non-Traumatic Spinal Cord Injury
❖ Robbie Veriker, MD
- 84** Inclusion of Non-Traumatic Spinal Cord Injury in Spinal Cord Injury Model Systems Database: One Center's Experiences
❖ Yuying Chen, MD, PhD
- 85** Rehabilitation Outcomes for Patients with Epidural Lipomatous Myelopathy Compared to Traumatic Spinal Cord Injury
❖ Ben Johnson, N/A
- 86** Demographics and functional outcomes in Non-Traumatic vs Traumatic Spinal Cord Injury
❖ Ana Valeria Aguirre Guemez, MD

OTHER

- 87** Standardized 3D Printed Devices with Patient Specific Interfaces
❖ Jared Grier, B.S. ME
- 88** Integration of Multi-Functional Nanostructured Microelectrodes onto a Mechanically-Adaptive Polymer Nanocomposite for Neural Interfacing Applications
❖ Allison Hess-Dunning, PhD
- 89** Goals Categories Identified by Patients After Peripheral Nerve Transfer (PNT)
❖ Parvin Eftekhari
- 90** Perceived Impact of the COVID-19 Pandemic Among People with Spinal Cord Injury: A Descriptive Study
❖ James Krause, PhD
- 91** Functional Improvements Caused by the Utilization of Myoelectric Powered Wearable Orthotics in Persons with Chronic SCI
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The SCI Community



ANNOUNCING TWO NEW PUBLICATIONS

The American Spinal Injury Association is pleased to announce two new Publications for Spinal Cord Injury Professionals, Patients, and Caregivers.

The Durable Medical Equipment Guide and the SCI Traveler were created by experts in the field of Spinal Cord Injury and Rehabilitation.

DURABLE MEDICAL EQUIPMENT GUIDE

THE SCI TRAVELER

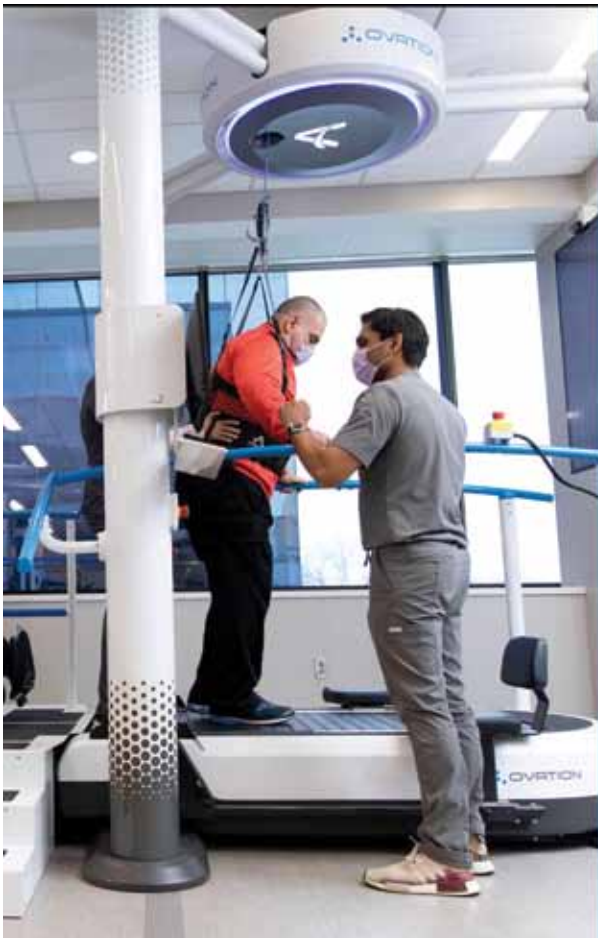


Scan QR Codes using the camera app on your phone. Click the link that pops up to connect to the online SCI Traveler or the DME Guide!



Sponsorships are available for both publications. This is a high-visibility opportunity! Contact the ASIA office if you would like to sponsor the DME Guide and/or the SCI Traveler.

ASIA office: asia.office@asia-spinalinjury.org



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At The Mount Sinai Spinal Cord Injury Program, we offer several programs designed to facilitate community reintegration.

Activities include an adaptive sports program for individuals who have completed inpatient rehabilitation called the **Life Challenge Adventure program**, several support groups including a women-only group, online **Fitness Classes**, a **meditation group**, and a structured **peer mentoring program**.

For more information visit: www.MountSinaiSCI.org

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- Monthly Newsletter "The Spinal Connection"
- Zoom Webinars/Presentations
- Share SCI events, programs, new treatments, research & developments via our social media pages

Virtual Weekly Events

- Meditation
- Sitress Fitness Class
- Transitions Support Group
- Women on Wheels Support Group
- Seated Zumba Dance Class
- SCI Peer Support Group
- Adaptive Boxing Class

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PRIMARY CARE PROVIDERS SCI Rehabilitation Resources

Spinal Cord Injury Care For The Busy Provider

Care of individuals with spinal cord injury and dysfunction (SCI/D) can be complex. To address life-long needs of persons with SCI/D, this resource provides curated, and up-to-date information on management of secondary complications of SCI, tailored for the primary care provider.



Need better POINT OF CARE resources while caring for your patients with Spinal Cord Injuries? You've come to the right place.



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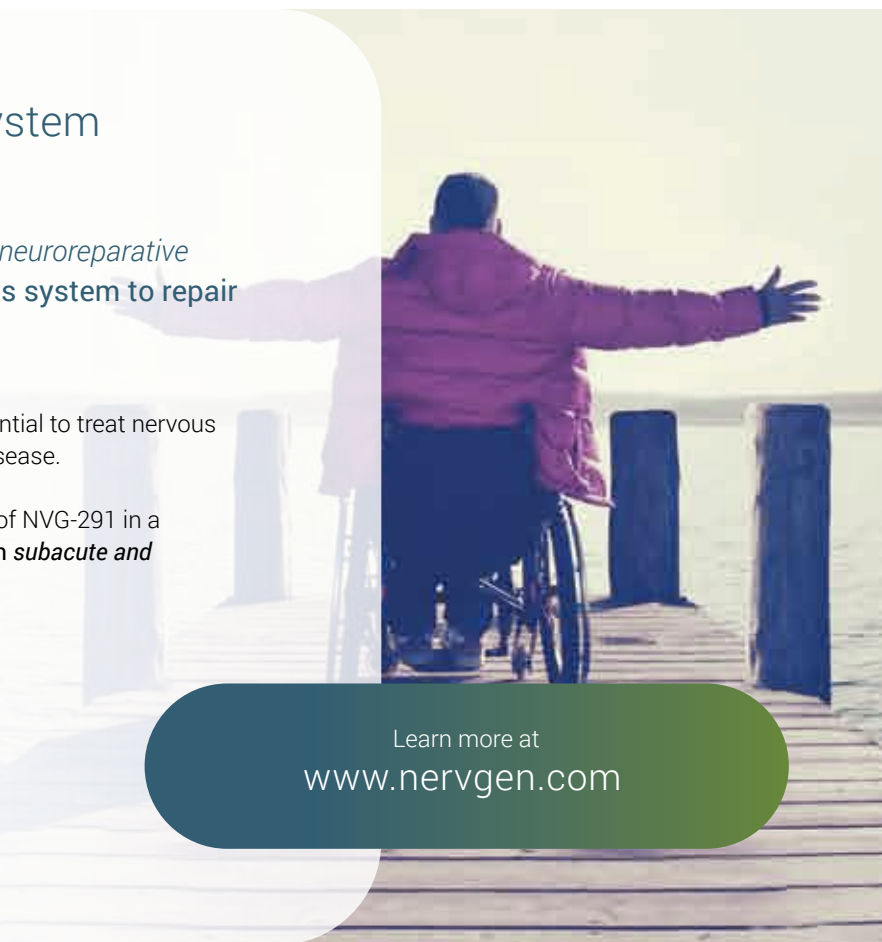
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