

North American Congress of Clinical Toxicology

September 23-27, 2019

Renaissance Hote

September 23 • ACMT Pre-Symposium: Music City Mixology: The High Notes and Low Notes of Booze and Drugs

September 24 • AACT Pre-Symposium: Toxicologist versus Terrorist: Preparing for the Worst Call

September 25-27 • Main Congress

Sponsored By:

• American Academy of Clinical Toxicology • American Association of Poison Control Centers

With Content Provided By:

- American Academy of Clinical Toxicology
 - American Association of Poison Control Centers
 - American Board of Applied Toxicology
 American College of Medical Toxicology
- Canadian Association of Poison Control Centres
- Eurpoean Association of Poisons Centres and Clinical Toxicologists
 - Asia Pacific Association of Medical Toxicology
 - Society of Toxicology

Corporate Sponsors Diamond Level

Scientifi

BILETELING



RARE DISEASE RITHERAPEUTICS, INC.

Corporate Sponsor Gold Level:





CONTINUING

North American Congress of Clinical Toxicology 2019

Renaissance Nashville, TN September 23-27, 2019

Sponsored by:

American Academy of Clinical Toxicology American Association of Poison Control Centers

Collaborating Associations:

American College of Medical Toxicology Canadian Association of Poison Control Centres European Association of Poisons Centres and Clinical Toxicologists Asia Pacific Association of Medical Toxicology

Organized by:

The American Academy of Clinical Toxicology & The American Association of Poison Control Centers

Meeting Chairs:

Kirk Cumpston, DO, President-Elect, AACT Julie Weber, BS Pharm, President-Elect, AAPCC

Scientific Advisory Council:

Jon B. Cole, MD Chair Kennon Heard, MD, PhD Christina Hantsch Bardsley, MD Margaret Thompson, MD Nicholas Buckley, MD Bruno Megarbane, MD, PhD Alfred Aleguas, PharmD Howard McKinney, PharmD Jillian Theobald, MD, PhD

Finance & Sponsorship:

Shawn Varney, MD Jessica Konrath

Continuing Health Care Professional Education Committee:

Kirk Cumpston, DO Nadia Awad, PharmD Renee Petzel Gimbar, PharmD

Abstract Selection Committee:

Brandon Willis, DO, Chair John Devlin, MD John Cole, MD Samuel Stellpflug, MD

Public Education Committee:

Laura Morehouse, MPH, CHES Carissa McBurney, MPA

Specialist in Poison Information Committee:

Jamie Nisbet, RN Randy Badillo, RN

With Special Thanks To:

Leigh De La Torre & Alli Bamer, Contemporary Forums
Mark Kostic President, AACT
Jessica Konrath, Executive Director, AACT
Mark Ryan, PharmD, MD, President, AAPCC
Stephen Kaminski, JD, CEO, Executive Director, AAPCC

2019 NORTH AMERICAN CONGRESS OF CLINICAL TOXICOLOGY

Renaissance Hotel, Nashville TN September 23-27, 2019

Welcome to the North American Congress of Clinical Toxicology (NACCT). The American Academy of Clinical Toxicology (AACT) and American Association of Poison Control Centers (AAPCC) are pleased to be your hosts for the 2019 NACCT meeting in Nashville, TN. We hope that you find this a valuable educational experience as well as an enjoyable visit to Nashville. Contemporary Forums staff will be assisting the host associations. If you need any assistance, please do not hesitate to contact a staff member in the office located on the Lobby Level Grand Ballroom Foyer.

CONTINUING EDUCATION

If you have paid for CE credit, please remember to complete your online evaluations, attendance forms, and also print your Continuing Education Certificate at the end of the meeting. If you have not paid for CE credit and would like to do so, please stop by the NACCT registration desk at your earliest convenience.

NACCT will be utilizing CPE Monitor for tracking and reporting all ACPE-accredited continuing pharmacy education activities. Pharmacists are required to complete their e-profile at www.nabp.net in order to obtain a NABP e-Profile ID. Please remember that you will need to submit the NABP e-profile ID and your birthdate in order to receive CPE credit for NACCT 2019.

In order to obtain continuing education credit, evaluations must be completed after attendance of continuing education sessions held at NACCT. Individuals who do not complete the evaluations within 30 days of the meeting will not receive continuing education credit through NABP.

Name badges must be worn at all times to enter the Symposia, Exhibits, and Poster Sessions. Out of consideration to others, infants, children and spouses are not permitted in the sessions or refreshment areas.

ACMT Pre-Symposium: "Music City Mixology: The High Notes and Low Notes of Booze and Drugs"
Registration/Check-In will be held on Monday, September 23, 7:00 - 8:00 a.m. Grand Ballroom Foyer, Lobby Level.

<u>AACT Pre-Symposium:</u> "Toxicologist versus Terrorist: Preparing for the Worst Call" Registration/Check-In will be held on Tuesday, September 24, 7:00 - 8:00 a.m. Grand Ballroom Foyer, Lobby Level.

NACCT 2019 Main Congress Registration/Check-In will be held on Tuesday, September 24, 1:00 - 6:00 p.m. and Wednesday September 25, 7:00 a.m. - 6:00 p.m. Grand Ballroom Foyer, Lobby Level.

ACCESSING SPEAKER HANDOUTS:

Speaker **handouts** will be available for download beginning September 16, 2019 Please check <u>www.nacct.digitellinc.com</u> or the NACCT Mobile App for the most current session handouts as the content is periodically updated.

TAYLOR & FRANCIS CLINICAL TOXICOLOGY JOURNAL:

The hard-bound edition of the journal *Clinical Toxicology* will **not** be distributed onsite. Please download the PDF file of the abstracts prior to arriving at the conference, or view the abstracts *via* the NACCT Mobile App.

PRESENTERS

All presenters are asked to arrive at least 15 minutes prior to their scheduled presentation time. All presentations will be uploaded to the conference laptops in advance. Any updated presentations must be submitted as soon as possible on a flash drive to the conference registration desk. Poster presenters should note the appropriate poster set-up times in the meeting schedule. Please be certain to remove your poster within 30 minutes following your session to facilitate set-up for the next group.

MEALS

Continental Breakfast is available for meeting registrants only, Wednesday – Friday 7:00 - 8:30 a.m. in Grand Ballroom Foyer, Lobby Level. Beverages for mid-morning and afternoon breaks will be served in the exhibit/poster area, Broadway Ballroom, Meeting Space Level 1. While a few selected sessions do include a meal, most congress participants are responsible for their own lunch. Restaurant listings are available in the registration area and in the NACCT Mobile App. The hotel concierge/guest services agents are also happy to assist you in finding the perfect restaurant.

KEYNOTE PRESENTATION AND BREAKFAST Sponsored by Johnson & Johnson

The NACCT Keynote Presentation will be **Wednesday**, **September 25** with a Continental Breakfast served from **7:00 – 8:30 a.m.**, and the Keynote Presentation beginning promptly at **8:30 a.m.** in the **Grand Ballroom**, **Lobby Level**.

William C. Moyers is the vice president of public affairs and community relations for the Hazelden Betty Ford Foundation, the nation's premier non-profit provider of addiction treatment and related services. As the organization's public advocate since 1996, Moyers uses his own personal story to highlight the power of addiction and the promise and possibility of recovery from this chronic illness. He has appeared on Larry King Live, Oprah Winfrey, Good Morning America and National Public Radio. In 2006 his first book, a memoir, became a New York Times best-seller that is now in its third printing. A former journalist, Moyers lives in St. Paul, Minnesota. He is the father of three adult children.

OPENING RECEPTION

The Opening Reception will be held on **Wednesday, September 25, from 6:00 – 7:00 p.m.** in the Germantown 1-2, Meeting Space Level 2. Anyone who is not registered for the NACCT and wishes to attend the Opening Reception, will be required to pay a <u>one-time</u> **\$60.00** "Accompanying Person/Guest" fee. Please stop by the NACCT registration desk to sign up and pay.

TIN ROOF ON BROADWAY DINNER BUFFET & LIVE MUSIC Sponsored By BTG

The Dinner will be held on **Thursday, September 26 from 6:30 - 10:30 p.m.** Cocktails will be served from 6:30 -7:30 p.m., dinner will be served at 7:30 p.m., and music will begin around 7: 30 p.m. The Tin Roof on Broadway is located only 7-minute walk from the Renaissance, so we encourage all who are able, to walk and take in the city. See Mobile App for directions. If you have not yet bought your ticket for the party, please do so at the NACCT registration desk to purchase tickets. Ticket cost is \$100.00.

COMPLIMENTARY WIFI Sponsored by Rare Disease Therapeutics, Inc.

We ask that you only log in to the WIFI with only one device to ensure enough bandwidth for all conference participants. Internet will be available in all conference meeting space including exhibits, follow the steps below

INTERNET PASSCODE:

fab2

1. For Wireless Service:

Select the "Renaissance CONFERENCE" network from your list of available networks.

2. Open your web browser:

This should automatically bring up the login page. If not, type **login.globalsuite.net** into the web browser address bar and press Enter.

You should now see the login page.

- If you still don't see the login page, please ensure you are connected to the correct wireless network (See step 1).

3. Follow the on-screen instructions and accept the terms of service.

To access service options after logging in, type **services.globalsuite.net** into the web browser address bar and press Enter.

* 1

ONLINE LIBRARY

To be sure you receive the speakers' most current information in an environmentally-friendly way, the recorded conference sessions and PowerPoint slides will be available to you online on a complimentary basis. Your tuition includes access to the Online CE Library for the all Main Congress recorded sessions for which you registered.

Approximately three weeks after the meeting you will receive an *email* notifying you that the presentations recorded at the live conference, along with the synchronized PowerPoint slides, are available to access in the Online Library. Log in at www.nacct.digitellinc.com with the email address you registered with. Digitell representatives will be available on-site to assist you.

NACCT MOBILE APP - "Crowd Compass Attendee Hub"

Download the Attendee Hub Mobile App from the Apple or Google Play stores so you can stay current with real-time conference updates and notifications. Search "Crowd Compass Attendee Hub" in your provider's app store. Once you have downloaded the Attendee Hub app you can do a search for NACCT. You will find a complete schedule, full-text abstracts, speaker handouts, and additional conference information all only a tap away. After you download the app, you will login using your email address and a verification code will be emailed to you. You can also access the app by going to https://crowd.cc/nacct2019.

Some Schedule Highlights

To accommodate our ever-shortening attention spans, most speakers will again be giving 25-30 minute presentations instead of an hour. The overall amount of learning and CE available will remain the same as in years' past, just presented in a more compact and hopefully more useful, manner.

There will be a special site for those interested in toxicology fellowships to network with multiple programs.

"SAVASANA AWAKENS ""ROOTS to RISE": Yoga Class with George Bachman"

AAPCC: One - on - One NPDS Training

Prepare for perfection on your next Medical Toxicology LLSA examination!

To help with all the time zone hoppers, all business meetings will occur either at 0730 or during the lunch period. We hope this brings a bit more order, and more sleep, to those needing to attend more than just the CE sessions.

AIRPORT TRANSFER:

Metro bus service, ride-share (Nashville International Airport was the first airport in the country to allow ride-sharing services like Uber and Lyft to operate on the property.), shuttles, taxis, rental cars, and limousine service are available from the airport. Visit flynashville.com for details and contact information.

MESSAGES & PARTICIPANT ROSTER

The message board located near the NACCT Registration Desk is available for messages and announcements, and includes the pre-registered participant list. Please check this message board, and the mobile app, for important meeting updates.

TOBACCO USE RESTRICTIONS

It is the policy of The Sheraton Hotel that smoking, including use of vaping devices, and use of chewing tobacco is not permitted in the meeting rooms, around the NACCT Registration Desk, Exhibit/Poster space or refreshment break areas. Thank you for your cooperation.

PERSONAL BELONGINGS

Please be sure to take all personal belongings (e.g., jackets, tote bags, laptops, notebooks, etc.) with you when leaving the meeting rooms. NACCT cannot assume responsibility for lost or stolen articles.

TOURIST INFORMATION

Tourist information is offered by www.visitmusiccity.com

The hosts and participants of NACCT gratefully acknowledge the contributions of the meeting Corporate Sponsors:











2019 ABSTRACT REVIEWE

Cynthia Aaron **Steve** Aks Adam Algren

Debbie Anderson

Bruce **Anderson**

Patil Armenian

Arnold Justin

Emily Austin

Nadia **Awad Stacey** Bangh

Gillian Beauchamp

Vik Bebarta John **Benitez** Michael **Beuhler**

Doug **Borys**

Jeffrey Brent

Rebecca Bruccoleri

Sean **Bryant**

Jennie Buchanan

Cantrell Lee **Nathan** Charlton

Michael Christian

Daniel Cobaugh

Daniel Colby Cole Jon

Kirk Cumpston

Paul Dargan

Michael Darracq

William **Eggleston**

Natalija Farrell

Johathan Ford

Melissa Gittinger

Gorodetsky Rachel

Gosselin Sophie

Heard Kennon

Michael Hodgman Christopher Holstege

Kao Louise

Katzung Kate Ziad Kazzi

Kurt Kleinschmidt

Koch Adam

Kupferschmidt Hugo

JoAn Laes Becca Lange Dayne Laskey

Samanta Lee

Jimmy Leonard

Jenna LeRov

Dave Liss

Sara Lookabill

Joe **Maddry** Marrafa Jeanna Maskell **Kevin**

Rita McKeever

Bruno Megarbane

Maria Mercurio-Zappala

Jill **Michels Abby** Montague

Christine Murphy

Mark Mycyk

Kristine Nanagas

Tammy Noble **Noble** Matt

Sean Nordt

Travis Olives Pizon

Mohan Punja

Anthony

Rozier **Becky**

Ruck **Bruce**

Schaeffer Tammi Elizabeth Scharman

Lauren Schwartz

Schwarz Kerry Sessions Dan

Mazda Shirazi

Rick Spiller Matthew **Stanton**

Sam Stellpflug Stolbach Andrew

Christine Stork

Su Mark

Margaret Thomspon

Chris Tomaszewski

Tormoehlen Laura

Troendle Michelle

Ulici Alex

Shawn Varney

Eric Villeneuve

Steve Walsh Richard Wang

Tim Wiegand

Alan Woolf

Luke Yip

EXHIBITOR LIST NACCT 2019

American Board of Applied Toxicology (ABAT)

Advanced Hazmat Life Support

American Academy of Clinical Toxicology (AACT)

American Association of Poison Control Center (AAPCC)

American College of Medical Toxicology (ACMT)

Boston Scientific/BTG International Inc. (Diamond Sponsor)

CTEH, LLC

Johnson & Johnson Consumer Inc. (Gold Sponsor)

Living Healthy Corporation

PerkinElmer

Rare Disease Therapeutics, Inc. (Diamond Sponsor)

Rocky Mountain Poison & Drug Center (RMPDC) Denver Health

Taylor & Francis Group

TOXBASE

7:00 am – 4:30 pm Grand Foyer Lobby Level ACMT Pre-Symposium Registration / Information

7:00 am – 8:00 am Grand Ballroom 3 Lobby Level Continental Breakfast

8:00 am - 4:30 pm Grand Ballroom 3 Lobby Level ACMT Pre-Symposium: Music City Mixology: The High

Notes and Low Notes of Booze and Drugs

Moderators: Andrea Carlson, MD
Andrew King, MD
Daniel Sessions, MD
Christina Hantsch, MD

Presentations:

Smooth Operator: Addiction, Criminal Behavior, and Recidivism Christopher Holstege, MD

Always on the Mind: Neuroadaptations in Drug Use Donna Seger, MD

After the Storm: Therapies to Maintain Sobriety from Alcohol JoAn Laes, MD

The Shake: Management of Refractory Ethanol Withdrawal Cases Michael Lynch, MD

The Hippy Hippy Shake: Toxicology of Cocktails Daniel Sessions, MD

Detoxicity: The Toxicity of Medications for Withdrawal Michele Burns, MD, MPH

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Drunk Tank Case Studies:
Moderator Daniel Sessions, MD
Panelists:
Andy King, MD
JoAn Laes, MD
Michael Lynch, MD

In the Absinthe of Facts: Myths about Absinthe Elizabeth Moore, DO

The Achy Breaky Heart: Chronic Effects on the Heart by Methamphetamine and Other Stimulants Stephanie Weiss, MD, PhD

We are the World: Insights and Controversies from International Methanol Outbreaks Jeffrey Brent, MD, PhD

Dying to Pass: Toxicity of Agents Used to Pass Urine Drug Screening Andrew King, MD

Who is Going to Save your Soul, Juul? New Vaping Trends Fiona Garlich, MD

Drugs & Booze in the News Moderator: Andrea Carlson, MD Panelists: Sean Bryant, MD Nena Bowman, PharmD Fiona Garlich, MD

At the end of this session, the participant should be able to:

- 1. Discuss unique cases of criminal behavior associated with poisoning.
- 2. Consider a broader poisoning differential diagnosis.
- 3. Consider unique personalities associated with criminal poisoning.
- 4. Describe the changes in the CNS following drug use.
- 5. List the genetic changes that may occur following drug use.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 6. Compare the specific changes in the dopamine, dopamine transporter, immediate early genes and plasticity following drug use.
- 7. List the different pharmacotherapies for alcohol use disorder and how they can be implemented in a variety of healthcare settings.
- 8. Describe the pathophysiology of alcohol withdrawal.
- 9. Review evidence-based treatment of alcohol withdrawal.
- 10. Discuss novel approaches to the management of alcohol withdrawal.
- 11. Identify potential toxins in home prepared cocktail components.
- 12. Prepare for new toxicities from current cocktail trends.
- 13. Identify and treat toxicity from the combination of ethanol and other intoxicants.
- 14. Identify different agents used to treat opioid withdrawal.
- 15. Recognize potential adverse effects and toxicities of opioid withdrawal agents.
- 16. Explain management options for adverse effects and toxicities of opioid withdrawal agents.
- 17. Review the history of absinthe.
- 18. Identify common myths regarding absinthe toxicity.
- 19. Identify the major long-term cardiac effects of methamphetamine on the heart.
- 20. Compare and contrast the chronic cardiac effects of methamphetamine with other stimulants such as cocaine.
- 21. Understand the pathophysiology of methanol poisoning.
- 22. Treat a patient with methanol poisoning.
- 23. Understand the thresholds for treatment of methanol and ethanol poisoning.
- 24. Describe three of the most commonly employed methods to "pass" a urine drug screen.
- 25. Describe the potential toxicity of at least two of these methods.
- 26. Appreciate the epidemiology of e-cigarette use, and its burgeoning prevalence among adolescents.
- 27. Understand the potential toxicity of vaping, including risk of progression to traditional cigarette use.
- 28. Understand the unique risk of pediatric nicotine poisoning with exposure to ecigarette fluid.

8:00 am – 5:00 pm *AACT Board Meeting* Sylvan Park Meeting Space Level 2

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Monday, September 23, 2019 (continued)

Conference Schedule

12:00 pm – 6:00 pm

ABAT Exam (Part 1)

Melrose

Meeting Space Level 1

5:00 pm – 9:00 pm

ABAT Board Meeting (Part 1)

Edgehill

Meeting Space Level 2

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

7:00 am – 1:00 pm Grand Ballroom Lobby Level AACT Pre-Meeting Symposium Registration / Information

7:00 am – 8:00 am Grand Ballroom Foyer Lobby Level Continental Breakfast

8:00 am - 4:30 pm Grand Ballroom 3 Lobby Level AACT Pre-Symposium: Toxicologist versus Terrorist:

Preparing for the Worst Call

Moderators: Jillian Theobald, MD, PhD Kennon Heard, MD, PhD

Presentations: Soman Sarin Novichok Emily Kiernan, DO

Weapons of Opportunity Frank Walter, MD

Atropine Sean Bryant, MD

2PAM Steve Bird, MD

Antidote Stockpile Sue Gorman, PharmD

Vomiting Agents – Organoarsenic Compounds Annie Arens, MD

Cyanide /H2SCyanide Vikhyat Bebarta, MD

Phosgene Chloride, Tear Gas, Nitrochloroform William Eggleston, PharmD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Biologicals Heather Young, MD

Genetic Terrorism Jillian Theobald, MD, PhD

Radioactive Terrorism Carol Iddins, MD

Risk Communications Vivi Siegel, MD

Mass Hysteria Timothy Jones, MD

The Greatest Threat Panel Discussion Emily Kiernan, DO Frank Walter, MD Sean Bryant, MD Steve Bird, MD Sue Gorman, MD Annie Arens, MD Vikhyat Bebarta, MD William Eggleston, PharmD Heather Young, MD Jillian Theobald, MD, PhD Carol Iddins, MD Vivi Siegel, MD Timothy Jones, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of this session, the participant should be able to:

- 1. Integrate knowledge of some of the recent worldwide events involving nerve agents into your practice.
- 2. Compare and contrast the decisions made when identifying and treating patients from nerve agent attacks.
- 3. Recite the role a toxicologist can play in a nerve agent attack.
- 4. Identify and discuss the physical property that many of chemical weapons of opportunity share.
- 5. List the relative toxicity of various chemical weapons of opportunity.
- 6. Identify and discuss the fundamental therapeutic modality for many chemical weapons of opportunity.
- 7. Recite the pharmacology of atropine.
- 8. Discuss atropine utilization in times of terrorism and war.
- 9. Compare and contrast the strengths and weaknesses of various alternative antimuscarinic agents when atropine is in short supply.
- 10. Describe the basic structure of oximes.
- 11. List the limitations to oxime use.
- 12. Identify scenarios when oxime use is indicated.
- 13. Describe the ways in which the Strategic National Stockpile may respond to an incident.
- 14. Describe the SNS CHEMPACK program.
- 15. Describe the history of the development and use of organoarsenic compounds as chemical warfare agents.
- 16. Describe the clinical effects of exposure to organoarsenic compounds.
- 17. Recite the proposed mechanism of toxicity of organoarsenic compounds.
- 18. Determine the clinical effects of Cyanide /H2S poisoning.
- 19. Describe the new therapies for cyanide.
- 20. Describe the new therapies or H2S.
- 21. Describe the toxicities associated with gases used as chemical warfare agents or deterrents.
- 22. Discuss the history of toxic gases as agents of chemical warfare.
- 23. Develop a monitoring and treatment plan for patient's presenting after a toxic gas exposure.
- 24. Identify clinical syndromes consistent with bioterrorism agents.
- 25. Select appropriate personal protective equipment and post-exposure prophylaxis for bioterrorism agents.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 26. Compare gene editing techniques.
- 27. Discuss the potential for large scale genomic bioterrorism.
- 28. Examine the necessary public health response to a genetic bioterrorism attack.
- 29. Describe radiological sources/devices that may cause medical issues to individuals or to the public.
- 30. Describe situations in which some of these sources have been used to cause or attempt to cause injuries/illnesses.
- 31. Identify the six principles of Crisis and Emergency Risk Communication.
- 32. Apply CERC principles to communicating about chemical exposures.
- 33. Prepare a simple communications plan related to chemical exposure.
- 34. Identify factors associated with psychogenic illness.
- 35. Implement effective responses to mitigate adverse consequences from a mass psychogenic event.

8:00 am – 2:00 pm *ABAT Exam* (Part 2)

Melrose

Meeting Space Level 1

8:00 am – 5:00 pm *ACMT Board Meeting*

Midtown 1

Meeting Space Level 2

9:00 am – 5:00 pm *ABAT Board Meeting* (Part 2)

Edgehill

Meeting Space Level 2

12:00 pm – 5:00 pm *AAPCC Board Meeting* (Part 1)

Sylvan Park

Meeting Space Level 2

1:00 pm – 6:00 pm NACCT Conference Registration / Information

Grand Ballroom Foyer

Lobby Level

1:00 pm - 5:00 pm Exhibitor Set - Up

Broadway Ballroom
Meeting Space Level 1

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

1:00 pm – 5:00 pm

Broadway Ballroom Meeting Space Level 1 Poster Session I Set-Up - Abstracts # 17-116

4:00 pm – 7:00 pm

AAPCC SPI Advisory Council

Midtown 2

Meeting Space Level 2

5:00 pm - 10:00 pm * AAPCC Accreditation Committee Meeting *

Midtown 3

Meeting Space Level 2

5:00 pm – 6:00 pm AAPCC Benchmarking / QA Meeting

Sylvan Park

Meeting Space Level 2

5:00 pm – 6:00 pm PEC Steering Committee

5 Points

Meeting Space Level1

5:00 pm - 7:00 pm ACMT Medical Toxicology:

Grand Ballroom 3 21st Annual Clinical Pathophysiology Competition

Lobby Level Moderator: Jeffrey R. Suchard, MD

At the end of the session, the participant should be able to:

1. Generate a good differential diagnosis of anion gap metabolic acidosis.

2. Describe the management of several unique poisonings.

3. Identify potential pitfalls in the diagnostic approach to poisoned patients.

6:00 pm – 7:00 pm PEC Open Meeting

Melrose

Meeting Space Level 1

6:00 pm – 7:00 pm AAPCC Micromedex Joint Coding Committee

Sylvan Park

Meeting Space Level 2

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Tuesday, September 24, 2019, continued

Conference Schedule

6:30 pm – 8:00 pm

CAPCC Business Meeting

Midtown 1

Meeting Space Level 2

7:00 pm- 9:00pm

AAPCC SPI Meet & Greet Reception

Offsite

George Jones Roof Top Lounge

7:00 pm -9:00 pm

PEC Meet and Greet

Edgehill

Meeting Space Level 2

7:00 pm – 7:45 pm

AACT Business & Membership Meeting

SoBro

Meeting Space Level 1

8:00 pm – 9:00 pm

AACT Members' Reception and FAACT Induction Ceremony

SoBro

Moderator: Mark Kostic, MD, AACT President

Meeting Space Level 1

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

7:00 am – 6:00 pm Grand Ballroom Foyer Lobby Level NACCT Main Congress Registration / Information

7:00 am - 8:30 am

Grand Foyer Lobby Level

Continental Breakfast

7:30 am – 8:30 am

Belle Meade

Meeting Space Level 1

AACT Envenomation Section

7:30 am – 8:30 am

SoBro

Meeting Space Level 1

AAPCC Managing Directors

7:30 am – 8:30 am

Midtown 1

Meeting Space Level 2

ACMT Quality Measures Workgroup

7:30 am – 8:30 am

Midtown 2

Meeting Space Level 2

ACMT Membership Committee

7:30 am – 8:30 am

Sylvan Park

Meeting Space Level 2

ACMT Research Committee

7:30 am – 8:30 am

Germantown 4

Meeting Space Level 2

AAPCC Medical Directors

7:30 am – 8:30 am

Midtown 3

Meeting Space Level 2

AACT Acute and Intensive Care Section

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Wednesday, September 25, 2019 (continued)

Conference Schedule

7:30 am – 8:00 am Germantown 3

Meeting Space Level 2

AACT Geriatric Section

7:30 am- 8:30 am

Fisk 1

Hotel Level 2

AACT Pediatric Section

7:30 am – 8:30 am

Edgehill

Meeting Space Level 2

AACT WMD Section

8:00 am – 5:00 pm

5 Points

Meeting Space Level 1

AAPCC: One - on - One NPDS Training

8:30 am - 12:30 pm

Melrose

Toxicology Fellowship Interest Group (Residents and medical

students)

Meeting Space Level 1

8:30 am - 9:30 am **Grand Ballroom Lobby Level**

NACCT Keynote Presentation:

Broken: My Story of Addiction and Redemption Sponsored by Johnson & Johnson Consumer, Inc. Moderators: Mark Kostic, MD, AACT President

Kirk Cumpston, DO, AACT President-Elect

Presenter: William Moyers

At the end of the session, the participant should be able to:

- 1. Identify the symptoms and problems caused by a substance use disorder.
- 2. Describe how to help somebody struggling with a substance use disorder.
- 3. Take steps to reduce the stigma of addiction and promote the power and possibility of recovery from it.

9:00 am - 4:00 pm**Broadway Ballroom** Meeting Space Level 1 Exhibits/Posters Session I - Abstracts # 17-116 Sponsored by: Rare Disease Therapeutics, Inc.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

9:30 am – 11:00 am Broadway Ballroom Meeting Space Level 1 Authors with Posters - Abstracts # 17-116

Refreshment Break

11:00 am - 11:30 am Grand Ballroom 2 Lobby Level 2 Lightning Oral Presentations Moderator: Jon Cole, MD

158 Same Day Transportation for Opioid Use Disorder: Impact of the Crisis Addiction Recovery Transportation (CART) Program, Andrew King, MD

254 Seizure Following Bupropion Insufflation: A National Poison Data System Study, Ronald Kirschner, MD

79 Characterization of acute exposures to cannabis resins, Matt Noble, MD

251 Cannabis Use and High-Risk Substance Use Behaviors in the United States
Non-Medical Use of Prescription Drugs (NMURx) National Survey, Janette Iwanicki, MD

At the end of the session, the participant should be able to:

- 1. Describe the successful hand off rate of a same-day referral and transportation program from the ED for patients with opioid-related diagnoses.
- 2. Characterize the incidence and onset of symptoms following bupropion insufflation abuse.
- 3. Discuss factors to consider in determining an appropriate observation period following bupropion insufflation.
- 4. Describe variability in poison center recommendations following bupropion insufflation.
- 5. Consider study data describing clinical effects associated with acute exposures to cannabis resins.
- Describe cannabis use and other substance use behaviors in the United States Non-Medical Use of Prescription Drugs (NMURx) National Survey.

11:00 am – 11:30 am <u>AAPCC</u>: Artificial Intelligence, Machine Learning and NPDS

Grand Ballroom 1 Applications

Lobby Level Moderators: Julie Weber, BS Pharm

Mark Ryan, PharmD

Presenter: Tina Moen, PharmD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Describe artificial intelligence opportunities in healthcare.
- 2. Leverage AI examples to envision AI strategy for their organizations.
- 3. Describe the strength of the combination of human + machine.

11:30- 12:30 pm

ACMT Practice Symposium: The Role of Personalized

Grand Ballroom 1 Medicine in Medical Toxicology Practice
Lobby Level Moderator: Christina Hantsch, MD

Presenters: Dan Roden, MD
Sarah Van Driest, MD, PhD

At the end of the session, the participant should be able to:

- 1. Recite the role of generic variation in drug metabolism.
- 2. Compare the role of genetic variation in drug response.
- 3. Provide a conceptual overview of drug gene interactions.
- 4. Discuss specific examples of drugs metabolized by CYP2D6.
- 5. Describe availability and technical limitations of CYP2D6 testing.

11:30 am - 12:30 pm Grand Ballroom 2 Lobby Level EAPCCT Scientific Symposium: Mechanistic Basic for Assessing Human Health Risks from Chemical Warfare Agents and Pesticides

Moderator: Martin Wilks, MD, PhD

Presenters: **Horst Thiermann, MD**
Martin Wilks, MD, PhD

At the end of the session, the participant should be able to:

- 1. Explain why forensic verification of sulphur mustard poisoning has to rely on specific biomarkers.
- 2. Explain why treatment of sulphur mustard poisoned patients consumes large resources.
- 3. Explain why treatment of sulphur mustard poisoning in the very early phase might be dangerous for medical personnel.
- 4. Discuss the differences in approach between international agencies when assessing toxicology data.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

5. Explain the controversy about carcinogenic properties of the herbicide glyphosate.

11:30 am – 12:30 pm <u>AACT Fellow/Trainee Research Platforms</u>

Grand Ballroom 3 Moderators: Mark Kostic, MD

Lobby Level Kennon Heard, MD, PhD

Systematic variations in the anion gap complicate the management of poisoned patients, Josh Wang, MD

Pharmaceutical Exposures in Pregnant Women Reported to the National Poison Data System from 2013 to 2018, Laurie Halmo, MD

Home Brew: A systematic approach to the evaluation of auto-brewery syndrome, Kim Aldy, DO

What's in a handful? Interpreting a commonly used unit of measurement, Tim Rianprakaisang, MD

A simple approximation of the QT nomogram, Steven Fishburn, MD

At the end of the session, the participant should be able to:

- 1. Recognize five sources of systematic or random bias that render the anion gap an imprecise diagnostic tool.
- 2. Describe common pharmaceutical exposures in pregnant women reported to poison centers in the United States.
- 3. Describe auto-brewery syndrome.
- 4. Predict the variability in estimation of "handful" as it relates to various pill sizes.
- 5. Illustrate a simple approximation of the QT nomogram for assessing drug induced QT prolongation.

11:30 am – 12:30 pm PEC: Prevention Response to the Opioid Epidemic

SoBro Moderator: Carissa McBurney, MPA

Meeting Space Level 1

Presenters: Wendy Blair Stephan, PhD, MPH, CHES
Jared O'Connor, MS, MPH
Laura Morehouse, MPH, CHES

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Converse how a poison center may partner with a needle exchange program to address opioid overdoses in a community.
- 2. Recognize potential challenges when participating in harm reduction initiatives such as needle exchange programs.
- 3. Discuss the safety benefits of disposing unused medications.
- 4. Describe how Google maps is used to list medication take back locations.
- 5. Describe the process of designing and implementing an opioid overdose education program in rural counties.

12:00 pm – 1:30 pm Midtown 1 Meeting Space Level 2	*AACT Clinical Toxicology Editorial Board Meeting*
12:30 pm – 1:30 pm	Lunch on Your Own
12:30 pm – 1:30 pm Belle Meade Meeting Space Level 1	*Tox Collaborative AC Project*
12:30 pm – 1:30 pm Wedgewood Meeting Space Level 2	AAPCC Government Affairs Committee
12:30 pm – 2:00 pm Edgehill Meeting Space Level 2	*AHLS Board Meeting*
12:30 pm – 1:30 pm Midtown 2 Meeting Space Level 2	ACMT Women in Tox Section

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Wednesday, September 25, 2019 (continued)

Conference Schedule

12:30 pm – 1:30 pm

Sylvan Park

Meeting Space Level 2

12:30 pm - 1:30 pm

Germantown 4

Meeting Space Level 2

12:30 pm – 1:30 pm

Germantown 3

Meeting Space Level 2

ACMT ToxIC Network

ACMT Industry Section

AACT Herbs and Dietary Supplements Section

1:30 pm - 3:30 pm Grand Ballroom 2 Lobby Level Platform Session I: Abstracts # 1-8
Moderators: Kirk Cumpston, DO
Martin Wilks, MD, PhD

#1 Assessment of microRNA-122 for Drug-Induced Liver Injury in Patients with Muscle Injury, Jada (Yu) Zhang MS, PhD

#2 Efficacy of oral administration of sodium thiosulfate and glycine in a large, swine model of oral cyanide toxicity, Patrick Ng, MD

#3 Accuracy of patient exposure history compared with analytical findings for those reporting use of synthetic cannabinoid receptor agonists, Simon Thomas MD

#4 The Effect of 4-Methylpyrazole on Oxidative Metabolism of Acetaminophen in Human Volunteers, A. Min Kang MD

#5 Effectiveness of antivenom for definite red-bellied black snake (Pseudechis porphyriacus) envenomation, Geoffrey Isbister, MD

#6 Severe delayed QT prolongation: a novel risk factor for adverse cardiovascular events from acute drug overdose, Eleanor Roberts, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

#7 Associations of Prenatal Manganese with Visual-Motor Skills in Adolescence, Bryan Stierman, MD, MPH

#8 Antiemetics Effectiveness for Cannabinoid Hyperemesis Syndrome (CHS) Emergency Department (ED) Encounters, Susan Hammerman, BS

At the end of the session, the participant should be able to:

- 1. Compare aminotransferases with microRNA 122 could be a more reliable biomarker to identify drug-induced liver injury in patients with muscle injury.
- 2. Explain the basic pathophysiology of oral cyanide poisoning.
- 3. Explain the basic therapeutic targets for treatment of oral cyanide poisoning.
- 4. Describe the sensitivity and specificity of patient history in determining analytically-confirmed exposure to synthetic cannabinoids.
- 5. Quantify the numbers of separate drugs of misuse found in samples from users declaring exposure to a single substance.
- 6. Describe an effect of fomepizole on acetaminophen metabolism.
- 7. Recite the importance of early antivenom in snake envenomation.
- 8. Review how severe QTc prolongation (>500 ms) is be a predictor of adverse cardiovascular events (ACVE).
- 9. Describe clinical predictors of ACVE from drug overdose.
- 10. Consider whether dsQTp after drug exposure is an independent predictor for ACVE.
- 11. Identify the clinical effects associated with manganese exposure in children.
- 12. Recognize that subclinical effects from manganese can occur with lower level exposure to heavy metals.
- 13. Identify and evaluate relative effectiveness of various types of antiemetics used by a large Colorado urban academic ED to treat CHS.

1:30 pm – 2:30 pm PEC: Achieving Cultural Appropriateness in Health

SoBro Education Programs

Meeting Space Level 1 Moderators: Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

Presenter: Tiffany Israel, MSSW

At the end of the session, the participant should be able to:

- 1. Discuss how to develop awareness of cultural issues among different populations.
- 2. Identify the different strategies used in health education to achieve a level of cultural appropriateness.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

3. Discuss application of culturally appropriate strategies to health education interventions.

2:30 pm – 3:30 pm PEC: Establishing Evidence-Based Programs for Poison

SoBro Education

Meeting Space Level 1 Moderators: Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

Presenters: Alexa Steverson, MA Lauren Longo, MSPH

At the end of the session the participant should be able to:

- 1. Dissect the elements of evidence-based public health within a poison prevention educational campaign.
- 2. Appraise the degree to which evidence-based public health is applied in personal practice.
- 3. Define the characteristics of an evidence-based public health approach.
- 4. Preview tools available to assist the public health educator in applying an evidence-based framework to practice.
- 5. Apply the educational components of a case study of an evidence-based poison prevention campaign to their own work.

3:30 pm – 3:45 pm R

Refreshment Break

Broadway Ballroom Meeting Space Level 1

3:45 pm – 4:45 pm AACT Herbal Dietary Supplement Special Interest Section

Symposium: An update on CBD

Ballroom Level Moderator: Michael Hodgman, MD

Presenters: George Sam Wang, MD
Michael Hodgman, MD

At the end of the session the participant should be able to:

- 1. Contrast the differences between hemp and marijuana.
- 2. Describe the currently regulatory status of cannabidiol in the United States.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 3. Discuss potential health benefits or medical indications where cannabidiol may be of benefit.
- 4. Describe the difference, by legal definition, between hemp and cannabis.
- 5. Discuss the legal limbo of cannabidiol as far as being considered a food or a dietary supplement.

3:45 pm - 4:45 pm Grand Ballroom 2 Lobby Level AACT: Diversity and Inclusion in Toxicology/Women in

Toxicology

Moderator: Meghan Spyres, MD

Presenters: Meghan Spyres, MD
Jennie Buchanan, MD
Michelle Ruhu, MD
Karen Simone, PharmD

At the end of the session the participant should be able to:

- 1. Review of gender distribution of presentations, lecturers, panelists, awards/grants given to NACCT/ACMT members 2015-2019.
- 2. Discussion of challenges of being a female in toxicology.
- 3. Discussion of benefits of being a female in toxicology.
- 4. Describe the trend of women in toxicology over the past 30 years.

3:45 pm – 4:45 pm Grand Ballroom 3 Lobby Level AAPCC Best Practice Symposium: Remote Workers and the Poison Center Environment: Making Work from Home Work

Moderator: Jamie Nisbet, RN

Presenters: Erin Pallasch, PharmD
George Bachman, BS Pharm
Carol DesLauriers, PharmD
Gaylord Lopez, PharmD

At the end of the session the participant should be able to:

- 1. List the benefits and detriments to CSPI job satisfaction in centers that utilize remote working.
- 2. Describe ways remote working directly benefits poison center services.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 3. Identify the type of strategies and policies necessary for a successful remote working program.
- 4. Compare the policies and procedures that have been developed for staff managing poisoning cases from home, with policies and procedures when working in the poison center.
- 5. List potential pros and cons for managing poisoning cases from outside the poison center setting.

3:45 pm - 4:45 pm SoBro Meeting Space Level 1 <u>PEC:</u> Preparing for the Accreditation Application Moderators: Laura Morehouse, MPH, CHES Carissa McBurney, MPA

Presenters: Christina DeRienzo, MHIT Lee Livermore, BAA

At the end of the session the participant should be able to:

- 1. Identify how to align your goals and objectives with your need's assessment data.
- 2. Determine priority populations and justify why they were selected.
- 3. Assess your education outreach and impact with proper evaluation tools.

4:00 pm – 4:30 pm Broadway Ballroom Meeting space Level 1 Posters Session I Tear Down – Abstracts # 17-116

4:45 pm - 5:45 pm Grand Ballroom 1 Lobby Level <u>CAPCC Symposium</u>: Medical Assistance in Dying: A Canadian Perspective and Drug-ectomies: Deprescribing in your older patients

Moderators: Margaret Thompson, MD Ryan Chaung, MD

Presenters: Tom Rich, MD, CCFP-EM, FCFP Howard An, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session the participant should be able to:

- 1. Recount the MAID program in Canada.
- 2. List the medications being used for MAID procedures in Canada.
- 3. Discuss polypharmacy, adverse drug events, and the scope of the problem.
- 4. Discuss aging and its effect on pharmacokinetics.
- 5. Discuss an approach to deprescribing with example medications to consider.

4:45 pm – 5:45 pm Grand Ballroom 2 Lobby Level ABAT Scientific Symposium: Naloxone Distribution Grand Programs, Toxicology, & Pharmacology Moderators: Howard McKinney Jr. PharmD Rachel Gorodetsky, PharmD

Presenters: William Eggleston, PharmD
Rachel Schult, PharmD

At the end of the session the participant should be able to:

- 1. Describe barriers to naloxone access and alternative distribution models in North America.
- 2. Assess the risks and benefits of expanded access to naloxone, high dose naloxone, naloxone devices, and proposed alternatives.
- 3. Develop patient care strategies for increasing access to medication assisted treatment and harm reduction resources in North America.

4:45 pm – 5:45 pm Grand Ballroom 3 Lobby Level AACT Occupational and Environmental Symposium:
Occupational Exposure to Fentanyl and Synthetic
Cannabinoids - Science beyond the Hype Programs,
Toxicology, & Pharmacology
Moderator: Michael Greenberg, MD

Presenters: **Robert Palmer, PhD**
Michael Moss, MD
Allison Muller, PharmD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session the participant should be able to:

- 1. Contrast the history, previous recommendations, actions by law enforcement agencies, unions, public health agencies with today.
- 2. Describe potential routes of exposure in handling novel psychoactive substances and risk of toxicity.
- 3. Make reasonable recommendations for PPE for first responders based on potential for toxicity.
- 4. State two elements for building trust and credibility in risk communication.
- 5. List two key risk communication skills for communicating to non-toxicology audiences.

5:00 pm – 5:45 pm Broadway Ballroom Meeting Space Level 1	Poster Session II Set Up - Abstracts # 117-213
6:00 pm – 7:00 pm Germantown Ballroom Meeting Space Level 2	NACCT Opening Reception
7:00 pm – 8:30 pm Grand Ballroom 1 Lobby Level	AAPCC Quiz Bowl, SPI Awards and Scientific Poster Awards Quiz Bowl Moderator: Prashant Joshi, MD
7:30 pm – 10:00 pm Offsite	* NACCT Sponsors and Friends Dinner *
7:00 pm – 8:00 pm SoBro Meeting Space Level 1	ABAT Business Meeting
8:00 pm – 9:30 pm Wedgewood Meeting Space Level 2	ABAT Members' Reception

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Conference Schedule

7:00 am – 5:00 pm Grand Foyer Lobby Level	NACCT Main Congress Registration / Information
7:00 am – 8:30 am Grand Foyer Lobby Level	Continental Breakfast
7:00 am – 8:00 am Wedgewood Meeting Level 2	SAVASANA AWAKENS "ROOTS to RISE: Yoga Class with George Bachman
7:30 am – 8:30 am Grand Ballroom 3 Lobby Level	AAPCC Toxicall Users Group
7:30 am – 8:30 am SoBro Meeting Space Level 1	AAPCC ToxSentry Data Group
7:30 am – 8:30 am Belle Meade Meeting Space Level 1	AACT Scientific Committee
7:30 am – 8:30 am Sylvan Park Meeting Space Level 2	ACMT Medical Toxicology Fellow-in-Training Association
7:30 am – 8:30 am Midtown 2 Meeting Space Level 2	ACMT Practice Committee
7:30 am – 8:30 am Midtown 3	ACMT Fellowship Directors Committee

AACT History Section

Meeting Space Level 2

7:30 am – 8:00 am

Meeting Space Level 2

Midtown 1

Bold Face – indicates CE sessions

* Restricted to committee members *

** Presentation will not be audio recorded**

Thursday, September 26, 2019 (continued)

Conference Schedule

7:30 am – 8:30 am

Edgehill

AACT Envenomation Section

Meeting Space Level 2

7:30 am – 8:30 am

AACT Forensic Section

Germantown 2

Meeting Space Level 2

7:30 am – 8:30 am

AAPCC Surveillance Team

Melrose

Meeting Space Level 1

8:00 am – 5:00 pm

AAPCC: One - on - One NPDS Training

5 Points

Meeting Space Level 1

8:00 am – 8:30 am

AACT Occupational and Environmental Section

Midtown 1

Meeting Space Level 2

8:30 am – 9:00 am Grand Ballroom 1

**AACT Career Achievement Award: From there to here -

40 years and counting**

Moderator: Mark Kostic, MD

Presenter: Mary Ann Howland, PharmD

At the end of the session, the participant should be able to:

1. Describe the benefits of being mentored and mentoring.

2. Relay the teamwork that is necessary when editing a textbook.

8:30 am – 9:30 am PEC: How to Create, Fund, and Produce Educational

SoBro Materials

Meeting Space Level 1 Moderators: Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

Presenters: Sherrie Pace, MS

Alysia Longmire, OCPC Maureen Roland, RN, BSN

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Summarize examples of how to create educational content based on needs assessments.
- 2. Summarize ways to disseminate education programs to increase reach.
- 3. Cite examples of how to seek outside funding for the creation of educational materials.
- 4. Cite examples of how to produce quality education materials in a variety of formats.

9:00 am - 10:30 am Grand Ballroom 2 Lobby Level **Clinical Toxicology Recommendation Collaborative (AACT, APAMT, AAPCC, ACMT, CAPCC, EAPCCT) New guidelines on GI decontamination with Activated Charcoal**

Moderator: Robert S. Hoffman, MD

Presenters: Lotte Hoegberg, MSc., PhD
David Wood, MD
Sophie Goesslin, MD
Ingrid Berling, BMed
Rittirak Othing, MD

At the end of the session, the participant should be able to:

- 1. Explain the concept of Indirectness of pharmacokinetic and toxicokinetic data compared to patient centered outcomes.
- 2. Categorize the evidence for SDAC administration based on the nature of the toxin.
- 3. Distinguish the kinetic differences between MDAC and SDAC based on the nature of the toxin.
- 4. Appraise the evidence regarding benefit of AC administration with various postingestion delays.
- 5. Create the risk portion of a formal risk: benefit analysis for activated charcoal administration.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

9:00 am - 4:00 pm Broadway Ballroom Meeting Space Level 1 Exhibits/ Poster Session II - Abstracts #117-213 Sponsored by: Rare Disease Therapeutics, Inc

9:00 am – 10:30 am Grand Ballroom 1 Lobby Level SPI Jeopardy
Moderator: Edward Bottei, MD

At the end of the session, the participant should be able to:

- 1. Identify diagnostic clues to help recognize uncommon exposures.
- 2. List diagnostic criteria for certain common exposures or syndromes.
- 3. Discuss strategies for managing uncommon exposures.

9:00 am - 10:00 am Grand Ballroom 3 Lobby Level ACMT Fellows-in-Training Visiting Professor Lecture – Teaching Toxicology to Other Professionals: The How and Why of Continuing Medical Education

Moderator: Andrew King, MD

Presenter: Allison Muller, PharmD

Panelists: Nena Bowman, PharmD
Andrea Carlson, MD

At the end of the session, the participant should be able to:

- 1. List 1 benefit of getting involved in CME in each of the three career stages.
- 2. State 2 examples of potential conflicts in CME content.
- 3. Identify at least 1 venue for CME-faculty opportunities.

10:00 am - 11:00 am Grand Ballroom 3 Lobby Level AACT Envenomation Special Interest Section Symposium-Brown Recluse Spider Envenomation Moderator: Nicklaus Brandehoff, MD

Presenters: Stephen Thornton, MD Donna Seger, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Explain how the diagnosis of brown recluse spider bites are made.
- 2. Compare and contrast the management strategies of two regional poison centers.
- 3. Summarize a feasible approach to a brown recluse spider bite that present with local or systemic symptoms.
- 4. Describe the pathophysiology in hemolysis of brown recluse spider bites.
- 5. Identify cutaneous lesions caused by BRSB.
- 6. Compare and contrast management controversies of treatment of cutaneous lesions and hemolysis.

10:00 am – 10:30 am **PEC: AAPCC Updates**

SoBro Moderators: Laura Morehouse, MPH, CHES

Meeting Space Level 1 Carissa McBurney, MPA

Presenter: Tara Robertson, JD

At the end of the session, the participant should be able to:

1. Describe AAPCC's initiatives aimed at raising national awareness of poison control centers.

2. Describe AAPCC's initiatives aimed at preventing unintentional poisonings.

10:30 am – 11:00 am <u>PEC:</u> *HRSA Updates*

SoBro Moderators: Laura Morehouse, MPH, CHES

Meeting Space Level 1 Carissa McBurney, MPA

Presenter: Jeremey Nelson

At the end of the session, the participant should be able to:

- 1. Identify HRSA's current projects related to the poison center promotion.
- 2. Recommend ways HRSA can support poison prevention programs.
- 3. Understand the 2019 achievements of the Poison Help campaign.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

10:30 am – 11:00am Grand Ballroom 2 Lobby Level

Lightning Oral Presentations

Moderator: Jillian Theobald, MD, PhD

Morbidity and Seizures Associated with e-cigarette Exposures, Dan Spyker, MD, PhD

Seniors and SUDS (Single-Use Detergent Sacs): A review of the National Poison Center Database, Kim Aldy, DO, MBA

Piloting Exposure Category Call Volume Algorithms to Improve National Public Health Surveillance Using Poison Control Center Call Data, Royal Law, PhD

Antecedent Activities, Exposure Site and Demographics of Crotalid Envenomation's Reported to One Southeastern United States Poison Center, 2014-2018, Michael Beuhler, MD

At the end of the session, the participant should be able to:

- 1. Appreciate the increase in the numbers of seizures reported in association with ecigarettes compared to other nicotine delivery systems.
- 2. Recognize the risk of single-use detergent sac exposure in the elderly.
- 3. Describe how the US Centers for Disease Control and Prevention has been piloting new algorithms to improve national surveillance using poison center data.
- 4. Describe the results of the piloting project.
- 5. Understand the activities preceding snake bites in the American southeast and how they differ from rattlesnake bites in the American west.

11:00 am – 12:00 pm Broadway Ballroom Meeting Space Level 1 Authors with Posters – Abstracts # 117-213

Refreshment Break

12:00 pm — 1:00 pm Lunch on your Own

12:00 pm – 1:00 pm Belle Meade **Tox Collaborative QT Project* *

Meeting Space Level 1

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

1:00 pm - 2:00 pm Grand Ballroom 2	Platform Session II: Abstracts #9-12 Moderators: Julie Weber, BS Pharm
12:00 pm – 1:00 pm Germantown 2 Meeting Space Level 2	*JMT Editorial Board Meeting*
12:00 pm – 1:00 pm Edgehill Meeting Space Level 2	ACMT Addiction Medicine Committee
12:00 pm – 1:00 pm Midtown 1 Meeting Space Level 2	ACMT Medical Toxicology Foundation Board Meeting
12:00 pm – 1:00 pm Midtown 3 Meeting Space Level 2	*AACT Fellows- in-Training and Leaders Luncheon*
12:00 pm – 1:30 pm Sylvan Park Meeting Space Level 2	AACT Clinical Toxicology Senior Editorial Board Meeting
12:00 pm – 1:00 pm Midtown 2 Meeting Space Level 2	*AAPCC Committee Chairs & Fatality Review Luncheon*

#9 National assessment of loperamide abuse awareness and ability to restrict purchase at retail pharmacies, Ryan Feldman, MD, Erik Everton, PharmD Candidate

Brandon Wills, DO

10 Impact of ASTM Safety Standard on Accidental Exposures to Liquid Laundry Packets in Children, Kate Reynolds, MPH

#11 Modern Lethality Rate of Suspected Cyclopeptide Mushroom Poisoning in the US: The Power of Supportive Care! Jonathan de Olano, MD

Bold Face – indicates CE sessions

Lobby Level

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

#12 Rates of adequate reversal and symptoms of opioid withdrawal syndrome (OWS) in patients treated initially with low dose naloxone or high dose naloxone,
Roy Purssell, MD

At the end of the session, the participant should be able to:

- 1. Demonstrate the prevalence of awareness of loperamide abuse and current state of ability to restrict sale throughout the US.
- 2. Recite the impact of product safety changes on pediatric accidental poison center exposures to liquid laundry packets.
- 3. Explain how the modern mortality rate for cyclopeptide mushroom poisoning in the US is less than historical standards.
- 4. Contrast the patients treated initially with low dose naloxone or high dose naloxone by comparing the different rates of adequate reversal and withdrawal symptoms

1:00 pm - 2:00 pm Grand Ballroom 1 Lobby Level AACT Radiation Special Interest Section Symposium: The Role of Poison Centers in Radiation Emergencies

Moderators: Emily Kiernan, DO

Justin Loden, PharmD

Presenters: Ziad Kazzi, MD Rebecca Bruccoleri, MD Carol Iddins, MD

At the end of the session, the participant should be able to:

- 1. List activities in radiation emergencies where PCs and clinical toxicologists are involved.
- 2. Discuss challenges facing PCs and clinical toxicologists in their roles related to radiation emergencies.
- 3. Discuss potential solutions to the above problems.

1:00 pm - 2:00 pm SoBro Meeting Space Level 1 <u>PEC:</u> Strategies for Social Media Success Best Practice for Reaching Tweens & Teens Moderator: Carissa McBurney, MPA

Laura Morehouse, MPH, CHES

Presenter: Brie Burge, BS Communications

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Summarize why the inclusion of graphics is important to improving engagement on social media.
- 2. Explain how to create effective graphics utilizing free and inexpensive web-based tools.
- 3. Describe how to employ Facebook advertising to promote their poison centers, including audience targeting.

1:00 pm - 2:00 pm Grand Ballroom 3 Lobby Level AAPCC SPI Clinical Practice Symposium: Don't Go Breakin' My Heart: Cardiac Medications and the Poisoned

Patient

Moderator: Jamie Nisbet, RN

Presenters: Anthony Pizon, MD
Elizabeth Scharman, PharmD

At the end of the session, the participant should be able to:

- 1. Differentiate between common cardiovascular medications seen in overdose situations.
- 2. Identify different therapies that may be used to treat the patient with a cardiovascular drug overdose.
- 3. Recognize pros and cons to therapies commonly used to treat the patient with a cardiovascular drug overdose.

2:00 pm - 3:00 pm Grand Ballroom 2 Ballroom Level AACT Scientific Symposium: Is CAOS causing CHAOS

Moderator: Robert S. Hoffman, MD

Presenters: Marco Sivilotti, MD
Donna Seger, MD
Sophie Goesslin, MD
Robert S. Hoffman, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Rate the evidence to support various intravenous n-acetylcysteine (NAC) regimens in acetaminophen (paracetamol, APAP) poisoning.
- 2. Develop an algorithm to individualize delivery to APAP poisoned patients.
- 3. Rate the evidence to support the need for multiple APAP concentrations in poisoned patients.
- 4. Use and evidence-based approach to develop a set of recommendations for gastrointestinal decontamination in APAP poisoned patients.

2:00 pm – 3:00 pm AAPCC Scientific Symposium - "Moonshine: Past, Present,

Grand Ballroom 1 Future"

Lobby Level Moderator: Julie Weber, BS Pharm

Presenter: Greg Eidam II, BS Engineering

At the end of the session, the participant should be able to:

1. Recite the history of moonshine and how it is intertwined with prohibition.

2. Describe the process of alcohol production and concerns for the home distiller.

3. Contrast the benefits of the evolution of the still and the risks of making moonshine.

2:30 pm – 3:30 pm PEC: Using Health Behavior Theories to Design and

SoBro Evaluate a Poison Prevention Program

Meeting Space Level 2 Moderators: Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

Presenter: Emily Paterson, BS, CHES

At the end of the session, the participant should be able to:

- 1. Discuss the different health behavior theories that act as foundations for program planning and development.
- 2. Apply the principles of health education theories to poison prevention program development.
- 3. Analyze how theories help planners identify suitable audiences, methods for fostering change, and outcomes for evaluation.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

2:00 pm - 3:30 pm Grand Ballroom 3 Lobby Level AACT/ACMT Pediatric Special Interest Section
Symposium - The Effects of Prenatal Addiction on Children

from Conception through Early Childhood

Moderator: Christine Murphy, MD

Presenters: Christine Murphy, MD
Elizabeth Hines, MD
Abby Montague, MD

At the end of the session, the participant should be able to:

- 1. Describe the effects of common drugs of abuse on fetal development.
- 2. Interpret common neonatal drug screens.
- 3. Recognize effects common drugs of abuse have on early childhood development.

3:30pm – 3:45 pm Broadway Ballroom Meeting Space Level 1 Refreshment Break

3:45 pm – 4:45 pm Grand Ballroom 1 Lobby Level **AACT Forensics Special Interest Section Symposium:** The

Toxicology of Criminal Activities

Moderator: Ram Rao, MD

Presenters: Rama Rao, MD

Sabra Botch-Jones, MS, MA, D-ABFT-FT

At the end of the session, the participant should be able to:

- 1. Compare the common presentations of drug facilitated sexual assault.
- 2. Appreciate the substantial gaps in understanding the handling and testing of samples.
- 3. Provide toxicologists with information to reduce medical and forensic miscommunication to survivors of suspected sexual assault.
- 4. Describe the analytical instrumentation utilized in forensic toxicology laboratories and the differences that may exist between clinical and forensic analysis.
- 5. List the challenges that face forensic toxicologist with the novel drugs and testing limitations and how these challenges may also impact clinical toxicology.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

3:45 pm – 4:45 pm Grand Ballroom 2 Lobby Level <u>ACMT Scientific Symposium - Tune in to That Cardiac</u>

Channel: Details on Calcium and Sodium

Moderator: Heather Long, MD

Presenters: Donna Seger, MD

Katherine Murray, MD

Björn Knollman, MD, PhD

At the end of the session, the participant should be able to:

- 1. Describe the structure and function of the cardiac sodium channel.
- 2. Describe the clinical and ECG manifestations of cardiac sodium channel blocker toxicity.
- 3. Elucidate the effects of pH on the cardiac sodium channel and channel blockers.
- 4. Understand the mechanism of action of calcium channel blockers.
- 5. Describe the difference between calcium channel blockers in terms of mechanisms in overdose.
- 6. Compare the physiology of calcium channel blockers in various organ systems.

3:45 pm – 4:45 pm Grand Ballroom 3 Lobby Level AAPCC Veterinary Symposium - Drug Testing and Doping

in Dogs and Racehorses

Moderator: Tina Wismer, DVM

Presenter: Lynn Hovda, BS Pharm, DVM

At the end of the session, the participant should be able to:

- 1. List the different types of drug testing in racehorses and when they are utilized.
- 2. Contrast the pros/cons of point of care ethylene glycol tests for dogs.
- 3. Identify several different drugs used as doping agents in racehorses.
- 4. Recognize the difference between customary use of therapeutic drugs and misuse or abuse of the same drug.

4:00 pm – 4:30 pm Broadway Ballroom Meeting Space Level 1 Poster Session II Tear Down - Abstracts # 117- 213

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Thursday, September 26, 2019 (continued)

Conference Schedule

4:30 pm – 5:00 pm
Broadway Ballroom
Meeting Space Level 2

Poster Session III Set Up - Abstracts # 214 - 310

4:45 pm – 6:00 pm Grand Ballroom 3 Lobby Level AAPCC Town Hall and Annual AAPCC Awards

6:30 pm – 10:30 pm Offsite Tin Roof on Broadway Dinner and Live Music Sponsored by Boston Scientific/ BTG

(Purchased ticket required)

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

7:00 am – 3:45 pm Grand Ballroom Foyer Lobby Level NAACT Main Congress Registration / Information

7:00 am – 8:30 am Grand Ballroom Foyer Lobby Level Continental Breakfast

7:30 am – 8:30 am Germantown 4

Meeting Space Level 2

ACMT Legal and Consultative Section

7:30 am – 8:30 am Germantown 1

Meeting Space Level 2

ACMT International Section and Committee

7:30 am – 8:30 am Belle Meade

Meeting Space Level 1

ACMT Pediatrics Section

7:30 am – 8:30 am

Sylvan Park

Meeting Space Level 2

AACT Trainee and Student Section

8:00 am – 3:45 pm

5 Points

Meeting Space Level 1

AAPCC: One - on - One NPDS Training

8:30 am – 10:00 am

Ballroom 1 Lobby Level **AACT Acute/Intensive Care Special Interest Section Grand**

Symposium

Moderators: Bryan Hayes, PharmD

Jenny Lu, MD

Presenters: John Downs, MD, MPH

Diana Dean, MD Kartik Shah, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Panelists: Diane Calello, MD
Nena Bowman, PharmD
Sarah Shafer, MD
Donna Seger, MD

At the end of the session, the participant should be able to:

- 1. Discuss the benefits versus risks of repeated use of sodium bicarbonate boluses in refractory sodium channel blockade.
- 2. Discuss the benefits versus risks of early administration of lipid emulsion rescue therapy.
- 3. Discuss the indications and timing for extracorporeal membrane oxygenation (ECMO) in severe cardiotoxicity.
- 4. Identify and manage methylxanthine toxicity.
- 5. Discuss when to initiate hemodialysis in methylxanthine toxicity.
- 6. Discuss strategies to manage cases of methylxanthine toxicity in a timely fashion.
- 7. Compare the benefits and risks of N-acetylcysteine in non-acetaminophen liver failure in the pediatric population.
- 8. Recite the common laboratory interferences with the salicylate and ethanol assays.

8:30 am - 10:00 am Grand Ballroom 2 Lobby Level <u>APAMT Symposium:</u> Charcoal is the New Black Moderator: Geoff Isbister, MD

Presenters: Angela Chiew, BSci(Med), MBBS Geoff Isbister, MD Nanayakkarawasam K Anjana Silva, MBBS, PhD

At the end of the session, the participant should be able to:

- 1. Recognize clinical situations in which benefit from charcoal is likely.
- 2. Recite the evidence indicates about risks from charcoal.
- 3. Define the effect of activated charcoal on the pharmacokinetics of drugs.
- 4. Describe the overall trends of charcoal usage in Sri Lankan hospitals for acute poisoning over last 15 years.
- 5. Describe the trends of charcoal usage in Sri Lankan hospitals for different types of acute poisoning over last 15 years.
- 6. Describe the outcomes of charcoal usage in Sri Lankan hospitals for acute poisoning over last 15 years.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

8:30 am – 10:30 am **PEC: Question, Persuade, Refer: A Training to Recognize

SoBro and Respond to Signs of Suicide**

Meeting Space Level 1 Moderators: Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

Presenter: Joanne Perley, MPH

At the end of the session, the participant should be able to:

1. Describe community and national resources and how to access them.

2. Contrast how suicide is a national and local public health problem.

9:00 am – 10:30am SPI Swap and Share

Germantown 2 Moderator: George Bachman, BS Pharm

Meeting Space Level 2

At the end of the session, the participant should be able to:

1. Discuss issues and management of those issues in challenging cases or circumstances.

2. Compare tools and aids such as references, charts, educational initiatives to foster enhanced learned information.

9:30 am – 2:45 pm Exhibits/ Poster Session III - Abstracts # 214-310 Riverside East Sponsored By: Rare Disease Therapeutics, Inc

East Tower Exhibit Level

10:00 am – 10:30 am Lightning Oral Presentations
Grand Ballroom 1 Moderator: Joao Delgado, MD

Lobby Level

Trends of Intentional Drug Overdose Among Youth: A Population-based Cohort Study, Meghan Gilley, MD

Toxic Brain Death Mimics, Lauren Murphy, MD

A systematic review and meta-analysis of alternative dosing to the FDA approved 3-bag regimen, Christian Garcia, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Is that really the level? On the imprecision of commonly ordered toxicological assays", Khameinei Ali, MD

At the end of the session, the participant should be able to:

- 1. Describe trends in intentional overdose amongst youth for the last 10 years.
- 2. Name three important drugs used frequently in intentional overdose.
- 3. Recognize substance that may cause absent brainstem reflexes, leading a physician to consider brain death.
- 4. Appreciate the frequency with which this occurs in regards to specific substances.
- 5. Provide a differential diagnosis for future consults pertaining to toxins that can cause profound coma.
- 6. Consider the risks and common side effects associated with the FDA approved.
- 7. Recognize the effect of analytical variation on the results of common toxicologic assay.

10:00 am - 10:30 am Grand Ballroom 2 Lobby Level <u>AAPCC Symposium:</u> Department of Homeland Security:

Drug Trafficking Interdiction

Moderator: Julie Weber, BS Pharm

Presenter: Mark Sutter, MD

At the end of the session, the participant should be able to:

- 1. Dictate how the DHS can interact with Poison Centers and public health.
- 2. Recite how to access information regarding drugs destined to your area.

1030 am – 11:30 am Broadway Ballroom Meeting Space Level 1 Authors with Posters / Abstracts # 214-310

Refreshment Break

11:30 am – 12:30 pm Lunch on Your Own

11:30 am - 12:30 pm

Edgehill

Meeting Space Level 2

PEC 2020 NACCT Planning Meeting

11:30am – 12:30 pm

ACMT Government Section

Germantown 1

Meeting Space Level 2

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

Friday, September 27, 2019, continued

11:30 am – 12:30 pm

Belle Meade

Meeting Space Level 1

AAPCC PoisonHelp.org Committee

11:30 am – 12:30 pm

Sylvan Park

Meeting Space Level 2

AAPCC Public Health Committee

11:30 am - 12:30 pm

Germantown 4 Hotel Level 2 **AACT Radiation Section**

12:30 pm – 1:30 pm Grand Ballroom 1

Lobby Level

Platform Session III: Abstracts #13 - 16

Moderators: Geoff Isbister, MD

Jeanna Marraffa, PharmD

13 Efficacy of Intravenous Hydroxocobalamin Versus Control for Treatment of Severe Methanethiol Toxicity in a Swine (Sus scrofa) Model, Joseph Maddry, MD

#14 Intravenous phytonadione administered orally for warfarin-related coagulopathy, Jordan Rice, PharmD

#15 Five Decades of Global Chemical Terror Attacks: Data to Inform Training and Preparedness, Michael DeLuca, MD

#16 Drug-Specific Anti-Xa Levels Before and After Infusion of Coagulation Factor Xa (recombinant), inactivated-zhzo (Andexxa®) for Bleeding in Patients Anticoagulated with Apixaban or Rivaroxaban: A Quality Improvement Project, Kelly Considine, PharmD

At the end of the session, the participant should be able to:

- 1. Describe the impact of hydroxocobalamin on vital signs in a pig model of methanethiol poisoning.
- 2. Describe the impact of hydroxocobalamin on mortality in a pig model of methanethiol poisoning.
- 3. Describe the limitations of this study.
- 4. Discuss the rationale and paucity of data comparing intravenous phytonadione given orally compared to oral phytonadione tablets.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 5. Describe the efficacy of the oral use of both products in warfarin-related coagulopathy.
- 6. Discuss pertinent toxicological indications for orally administered phytonadione.
- 7. Appreciate trends in the types of chemical weapons used in terror attacks over the past 50 years, and in particular since 2001.
- 8. Identify characteristics of worldwide chemical weapons terror events that can inform training and policy making.
- 9. Discuss the use of coagulation factor Xa (recombinant), inactivated-zhzo (Andexxa®) for bleeding at a Level I Trauma Hospital.
- 10. Contrast the pre- and post-infusion antiXa levels and how they compared to Annexa-4.
- 11. Define considerations for restrictions of use for coagulation factor Xa (recombinant), inactivated-zhzo (Andexxa®).

12:30 pm – 2:30 pm Grand Ballroom 2 Lobby Level **Review of the 2019 Medical Toxicology LLSA Articles**

Moderator: Jakub Furmaga, MD

Presenters: Brandon Wills, DO

Brandon Warrick, MD Jakub Furmaga, MD Evan Schwarz, MD

At the end of the session, the participant should be able to:

- 1. Discuss various important updates in the medical field of toxicology.
- 2. Describe important clinical evaluations and treatments for various toxicologic conditions

12:30 pm - 1:30 pm Grand Ballroom 3 Lobby Level SPI Roundtable Symposium Moderator: Randy Badillo, RN

Presenters: Caroline Werner, RN

Charisse Pizarro-Osilla, RN

Panelists: William Banner, MD
Kristie Edelen, PharmD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Discuss possible effects seen in a massive ibuprofen ingestion.
- 2. Discuss rescue therapies for critically ill poisoned patients.
- 3. Compare the 3 phases of nausea and vomiting in CHS.
- 4. Describe the treatment management in CHS.

12:30 pm – 1:30 pm PEC Swap and Share
Germantown 2 Moderators/Presenters:

Meeting Level 2 Laura Morehouse, MPH, CHES

Carissa McBurney, MPA

At the end of the session, the participant should be able to:

1. Recognize innovative and creative poison related public education programs.

- 2. List successful public education poison materials.
- 3. Identify successful poison prevention campaigns.
- 4. Recognize innovative and creative poison related public education programs.
- 5. List successful public education poison materials.
- 6. Identify successful poison prevention campaigns.

1:30 pm – 2:30 pm **ACMT Fellows-in-Training Roundtable:

Grand Ballroom 2 Developing an Inpatient Medical Toxicology Service **

Lobby Level Moderator: Jeffrey Brent, MD, PhD

Panelists: Richard Clark, MD
Daniel Brooks, MD

At the end of the session, the participant should be able to:

- 1. List the details of starting a medical toxicology service.
- 2. Describe how to maintain a division of Medical Toxicology.
- 3. Recite how a medical toxicologist can interact with an academic medical center.

1:30 pm – 2:30 pm PEC: Emergent Drugs of Abuse

SoBro Moderators: Laura Morehouse, MPH, CHES

Meeting Space Level 1 Carissa McBurney, MPA

Presenters: William Eggleston, PharmD Scott Phillips, MD

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

At the end of the session, the participant should be able to:

- 1. Describe the proposed indications for kratom and the current landscape of use in North America.
- 2. Compare and contrast the potential risks and benefits of kratom use.
- 3. Describe the international market place for illicit drugs.
- 4. List the most common global production sites.
- 5. Recite resources for information on international drug trafficking.

1:30 pm – 2:30 pm Grand Ballroom 1 **The UK Novichok Experience Symposium**

Moderator: David Gummin, MD

Presenter: Paul Russell, MD

At the end of the session, the participant should be able to:

- 1. Describe the basic pharmacology and action of nerve agent.
- 2. List the principles of treating an unknown chemical substance and the specific therapeutic options for treating nerve agent poisoning.
- 3. Recite on how an incident of this nature a multi-agency response is required to protect the patient, the attending staff and the community.

2:30 pm – 2:45 pm Broadway Ballroom Meeting Space Level 1 Refreshment Break

2:45 pm – 3:45 pm Grand Ballroom 1 Lobby Level <u>AACT Tox History Special Interest Section Symposium – Toxicology in Country Music</u>

Moderator: Anna Arroyo Plasencia, MD

Presenters: Denese Britt, RN
Adam Overberg, PharmD, BCPS

At the end of the session, the participant should be able to:

- 1. Explain the grass roots history of Moonshine.
- 2. Identify the necessary ingredients required to make Moonshine.
- 3. State whether Moonshine is a legal or illegal product.
- 4. Describe the history of drug references in popular music.
- 5. Appraise the drug references in several country music songs.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

2:45 pm - 3:45 pm Grand Ballroom 2 Lobby Level <u>Society of Toxicology Symposium</u> *Moderator: Ken McMartin, PhD*

Presenters: Chris Vulpe, MD, PhD
Diana Dow-Edwards PhD

At the end of the session, the participant should be able to:

- 1. Explain fundamentals of CRISPR technology.
- 2. Describe current and potential utilization of CRISPR in toxicology.
- 3. Articulate the endocannabinoid system in brain, the CB receptors and the role of endocannabinoids in brain physiology.
- 4. Understand the effects of marijuana on adolescent brain development including cognition, mental health and addiction.
- 5. Understand the dose-response nature of the effects of marijuana on the brain.

2:45 pm - 3:45 pm SoBro Meeting Space Level 1 <u>PEC:</u> Strategies to Strengthen the Poison Control Center Message for Diverse Multilingual Communities Moderators: Laura Morehouse, MPH, CHES Carissa McBurney, MPA

Presenters: Emilio Saenz,BS

Cassandra Vega, MPH

Cristina Thomas, M.Ed.

Lizbeth Petty, MPH

At the end of the session, the participant should be able to:

- 1. Describe how collaboration with promotoras (community health workers) can improve outreach to non-English speaking communities.
- 2. Describe how promotoras can also be used as a resource when translating materials.
- 3. Describe the needed steps when translating materials, including working with outside translation companies and community providers.
- 4. Describe strategies to field test translated materials.
- 5. Identify the range of organizations that educators can collaborate with to provide poison prevention information to non-English speaking communities.
- 6. Describe the methods that educators can use to relay poison prevention messaging to non-English speaking communities.

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

- 7. Identify the range of organizations that educators can collaborate with to provide poison prevention information to non-English speaking communities.
- 8. Describe the methods that educators can use to relay poison prevention messaging to non-English speaking communities.

2:45 pm –3:30 pm Broadway Ballroom Meeting Space Level 1 Poster Session III Tear Down – Abstracts # 214-310

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

8:00 am – 1:00 pm Fisk 2/Hotel Level 2 *AAPCC Board Meeting (Part 2) *

^{*} Restricted to committee members *

^{**} Presentation will not be audio recorded**

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

CONTINUING EDUCATION CREDIT

Requirements for Successful Completion

To successfully complete the requirements for Continuing Medical Education (CME) credit, Continuing Pharmaceutical Education (CPE) credit, or Continuing Education Contact Hours (Nursing), completes the following steps:

- 1. Submit the required Continuing Education Credit fee (\$200 for the Main Congress, \$80 for Premeeting Symposium).
- 2. Complete an online evaluation form for each session attended. Log in at nacct.digitellinc.com with the email address you registered with. Once logged in select Live Events. You will then see your event listed, select Access Event.
- 3. Your CE Certificate can be accessed and printed any time after you have completed the evaluation process by clicking on "CE Transcript" under "Your Account".
- 4. IMPORTANT: In order to obtain contact hours for the sessions you attended, you MUST complete the online evaluation process by <u>October 28, 2019.</u>

Objectives

List challenges facing Poison Centers and clinical toxicologists in their roles related to radiation emergencies.

Identify the complex and diverse needs of populations with different social and cultural realities. Compare different approaches to the diagnosis of complex poisoning cases based on limited data. Identify the effects of maternal drug use during pregnancy on children.

Contrast the different therapies that can be used to treat the cardiovascular effects of cardiac medications.

Identify xenobiotics that interfere with cardiac ion channel activity.

Identify currently available testing options in personalized medicine, including pharmacogenomics. Discuss exposure routes and absorption for fentanyl, fentanyl analogs, and synthetic cannabinoids. Develop an evidence-based approach to the treatment of patients with APAP overdose. Identify barriers and solutions to promote women in toxicology.

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

Satisfactory Completion

Learners must complete an evaluation form to receive a certificate of completion. You must attend the entire live activity as partial credit is not available. If you are seeking continuing education credit for a specialty not listed below, it is your responsibility to contact your licensing/certification board to determine course eligibility for your licensing/certification requirement.

Physicians / Pharmacists/Nurses



In support of improving patient care, this activity has been planned and implemented by Amedco LLC and American Academy of Clinical Toxicology. Amedco LLC is jointly accredited by the Accreditation Council for Continuing Medical Education (ACCME), the Accreditation Council for Pharmacy

Education (ACPE), and the American Nurses Credentialing Center (ANCC), to provide continuing education for the healthcare team. Credit Designation Statement – Amedco LLC designates this live activity for a maximum of 26.0 AMA PRA Category 1 Credits™ for physicians and 26.0 knowledge-based contact hours for pharmacists. Learners should claim only the credit commensurate with the extent of their participation in the activity.

NOTE to Pharmacists: The only official Statement of Credit is the one you pull from CPE Monitor. You must request your certificate within 30 days of the activity to meet the deadline for submission to CPE Monitor.

The American Academy of Clinical Toxicology is a designated provider of continuing education contact hours (CECH) in health education by the National Commission for Health Education Credentialing, Inc. The AAPCC Public Education Track is designated for Certified Health Education Specialists (CHES) to receive up to TBA total Category 1 continuing education contact hours. Maximum advanced-level continuing education contact hours available are 11 NCHEC Provider # 101772

(NOTE: Shaded areas denote concurrent sessions. Full credit will not be awarded for both sessions within a concurrent time block. Although poster sessions will be a part of the North American Congress of Clinical Toxicology 2019, except under special circumstances they will not be eligible for continuing education credit.)

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

Session	MD	RN	RPH	
Monday, September 23, 2019				
ACMT Pre -Symposium: Music City Mixology: The High Notes and Low Notes of Booze and Drugs	6.5	6.5	6.5	
Tuesday, Se	ptember 24, 2	019		
AACT Pre-Symposium: Toxicologist Versus Terrorist: Preparing for the Worst Call	7	7	7	
ACMT Medical Toxicology:21st Annual Clinical Pathologic Competition	2	2	2	
Wednesday, S	eptember 25,	2019		
NACCT Keynote Presentation: Broken: My Story of Addiction and Redemption	1	1	1	
Lightning Oral Presentations	0.5	0.5	0.5	
ACMT Practice Symposium: The Role of Personalized Medicine in Medical Toxicology Practice	1	1	1	
EAPCCT Scientific Symposium: Mechanistic basis for assessing human health risks from chemical warfare agents and pesticides	1	1	1	
AACT Fellows-in-Training Research Platform	1	1	1	
PEC-Prevention Response to the Opioid Epidemic	1	1	1	
Platform Session I	2	2	2	
PEC: Achieving Cultural Appropriateness in Health Education Programs	1	1	1	
PEC: Establishing Evidence-Based Programs for Poison Education	1	1	1	
AACT Herbal Dietary Supplement Special Interest Section Symposium: An update on CBD	1	1	1	
AACT Diversity and Inclusion in Toxicology/Women in Toxicology	1	1	1	
AAPCC Best Practice Symposium: Remote Workers and the Poison Center Environment: Making Work From Home Work	1	1	1	
PEC: Preparing for the Accreditation Application	1	1	1	
CAPCC Symposium	1	1	1	
ABAT Scientific Symposium-Naloxone Distribution Programs, Toxicology, & Pharmacology -	1	1	1	
AACT Occupational and Environmental Section Symposium: Occupational Exposure to Fentanyl and Synthetic Cannabinoids-Science Beyond the Hype	1	1	1	
Thursday, September 26, 2019				
AACT Career Achievement Award	0.5	0.5	0.5	
PEC: How to Create, Fund, and Produce Educational Materials	1	1	1	

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

Clinical Toxicology Recommendation Collaborative (AACT, APAMT, AAPCC, ACMT, CAPCC, EAPCCT) New guidelines on GI decontamination with Activated Charcoal	1.5	1.5	1.5	
SPI Jeopardy	1.5	1.5	1.5	
ACMT Fellows-in-Training Visiting Professor Lecture - Teaching Toxicology to Other Professionals: The How and Why of Continuing Medical Education	1	1	1	
PEC: AAPCC Updates	0.5	0.5	0.5	
AACT Envenomation Special Interest Section Symposium - Brown Recluse Spider Envenomation	1	1	1	
Lightning Oral Presentations	0.5	0.5	0.5	
PEC: HRSA Updates	0.5	0.5	0.5	
Platform Session II	1	1	1	
AACT Radiation Special Interest Section Symposium: The Role of Poison Centers in Radiation Emergencies	1	1	1	
PEC: Strategies for Social Media Success Best Practices for Reaching Tweens &Teens	1	1	1	
AAPCC SPI Clinical Practice Symposium: Don't Go Breakin' My Heart: Cardiac Medications and the Poisoned Patient	1	1	1	
AAPCC Scientific Symposium	1	1	1	
AACT Scientific Symposium: Is CAOS causing CHAOS	1	1	1	
AACT/ACMT Pediatric Special Interest Section Symposium: The Effects of Prenatal Addiction on Children from Conception Through Early Childhood	1.5	1.5	1.5	
PEC: Using Health Behavior Theories to Design and Evaluate a Poison Prevention Program	1	1	1	
ACMT Scientific Symposium - Tune in to That Cardiac Channel: Details on Calcium and Sodium	1	1	1	
AAPCC Veterinary Symposium –Drug Testing and Doping in Dogs and Racehorses.	1	1	1	
AACT Forensics Special Interest Section Symposium: The Toxicology of Criminal Activities	1	1	1	
Friday, September 27, 2019				
AACT Acute/Intensive Care Symposium	1.5	1.5	1.5	
APAMT Symposium: Charcoal is the New Black	1.5	1.5	1.5	
PEC: Question, Persuade, Refer: A Training to Recognize and Respond to Signs of Suicide	2	2	2	
SPI Swap and Share	1.5	1.5	1.5	

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

Lightning Oral Presentations	0.5	0.5	0.5
AAPCC: Department of Homeland Security: Drug Trafficking Interdiction	0.5	0.5	0.5
SPI Roundtable Symposium	1	1	1
Platform Session III	1	1	1
Review of the 2019 Medical Toxicology LLSA Articles	2	2	2
PEC Swap and Share	1	1	1
ACMT Fellow's-in Training Roundtable	1	1	1
PEC: Emergent Drugs of Abuse	1	1	1
The UK Novichok Experience Symposium	1	1	1
AACT Tox History Special Interest Section Symposium - Toxicology in Country Music	1	1	1
Society of Toxicology Symposium	1	1	1
PEC-Strategies to Strengthen the Poison Control Center Message for Diverse Multilingual Communities	1	1	1

DISCLOSURE OF SIGNIFICANT RELATIONSHIPS WITH RELEVANT COMMERCIAL COMPANIES/ORGANIZATIONS

The ACCME Standards for Commercial Support and ACPE Non-Commercialism Standards require presentations be free of commercial bias and that any information regarding commercial products / services be based on scientific methods generally accepted by the medical community. According to the American Academy of Clinical Toxicology "Policy on Non-Commercialism and Fair Balance", all faculty, authors, editors, and planning committee members (including their immediate family members) participating in an AACT-sponsored activity are required to disclose any relevant financial relationships with commercial interests. A commercial interest is any entity, producing, marketing, re-selling, or distributing health care goods or services consumed by, or used on, patients. Providers of clinical service directly to patients are not commercial interests. Financial relationships are those relationships in which the individual benefits by receiving a salary, royalty, intellectual property rights, consulting fee, honoraria for promotional speakers' bureau, ownership interest (e.g. stocks, stock options or other ownership interest, excluding diversified mutual funds), or other financial benefit. Financial benefits are usually associated with roles such as employment, management position, independent contractor (including contracted research), consulting, speaking and teaching, membership on advisory committees or review panels, board membership, and other activities from which remuneration is received, or expected. ACCME considered relationships of the person involved in the CME activity to include financial relationships of a spouse or partner. Contracted research includes research funding where the institution gets the grant and manages the fund and the person is the principal or named investigator on the grant.

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

There is no minimum dollar amount for relationships.

Should potential conflicts of interest be identified, AACT will resolve all conflicts of interest prior to the education activity being delivered to learners. Presentations offered by a person with a potential conflict of interest are required to submit a detailed outline of the presentation, which will be used by ACCT to confirm the scientific objectivity of the presentation. The audience will also be afforded the opportunity to evaluate whether the speaker's interests or relationships influenced the presentation with regard to exposition or conclusion through the use of the program evaluation instrument. Faculty, authors, editors or planning committee members that do not provide disclosure are ineligible to participate in the continuing education activity.

This educational activity has been planned to be well-balanced and objective in discussion of available treatment regimens. Interpretations and opinions offered by the authors represent their viewpoints. Conclusions drawn by the participant should be derived from careful consideration of all available scientific information.

When therapeutic options are discussed, it is our preference that only generic names be used. If it is necessary to use a trade name, then those of several companies must be used, if available. Products may be discussed in the treatment of indications outside current approved labeling. Speakers are required to disclose this to the participants.

RENAISSANCE HOTEL NASHVILLE, TN SEPTEMBER 23-27, 2019

Speaker/Planner/Reviewer Financial Relationships

The following table of disclosure information is provided to learners and contains the relevant financial relationships that each individual in a position to control the content disclosed to American Academy of Clinical Toxicology. All of these relationships were treated as a conflict of interest.

All individuals in a position to control the content of CE are listed in the program book. If their name is <u>not</u> listed below, they disclosed that they had no relevant financial relationships.

Name (role)	Commercial Interest Name	Type of Relationship
Michael Lynch MD (Speaker)	Adapt Pharma; no longer engaged	consulting fee/off label drugs
Michele Burns, MD, MPH (Speaker)	Up to Date: Pediatric Toxicology Section Editor	Royalty
George Sam Wang, MD (Speaker)	Authorship contributions to UpToDate on related topics/CDPHE grant evaluating pharmacokinetics of CBD in ped epilepsy/PEHSU	Royalty/Contracted Research/Consultant
Dan Spyker, MD, PhD (Speaker)	Alexza Pharmaceuticals, Inc	Consulting Fee
Kennon Heard, MD, PhD (Organizer)	McNeil Consumer Healthcare	Contracted Research
Kenneth McMartin, PhD (Organizer)	Paladin, Canada distributor of Antizol	Royalty

Thank You to our Corporate Sponsors!

Boston Scientific/ BTG.

Johnson & Johnson Consumer Inc.
Rare Disease Therapeutics, Inc.



The AAPCC Public Education Committee (PEC) Presents:

Educators welcome all poison center staff to participate in PEC sessions. Together, we can improve the understanding of poison centers and poison safety in our communities.

Achieving Cultural Appropriateness in Health Education Programs Wednesday, September 25, 1:30pm – 2:30 pm

A Community Navigator from the Vanderbilt Institute for Clinical and Translational Research will discuss methods to develop awareness of cultural issues among different populations and apply culturally appropriate strategies to health education interventions.

How to Create, Fund, and Produce Educational Materials Thursday, September 26, 8:30 am— 9:30 am

A panel of poison center educators will lead a discussion on the secret tips and tricks to mastering educational material development, including prioritizing needs, creating effective content, and finding outside funding sources.

Question, Persuade, Refer: A Training to Recognize and Respond to Signs of Suicide

Friday, September 27, 8:30 am – 10:30 am

The Director of Statewide Initiatives and Development, and certified QPR instructor, for the Tennessee Suicide Prevention Network will train session participants how to recognize the warning signs of a suicide crisis and how to question, persuade, and refer someone to help.

Medical,
Nursing,
Pharmacy
and CHES
credits are
available for
all PEC sessions.

See the NACCT schedule for all PEC session details





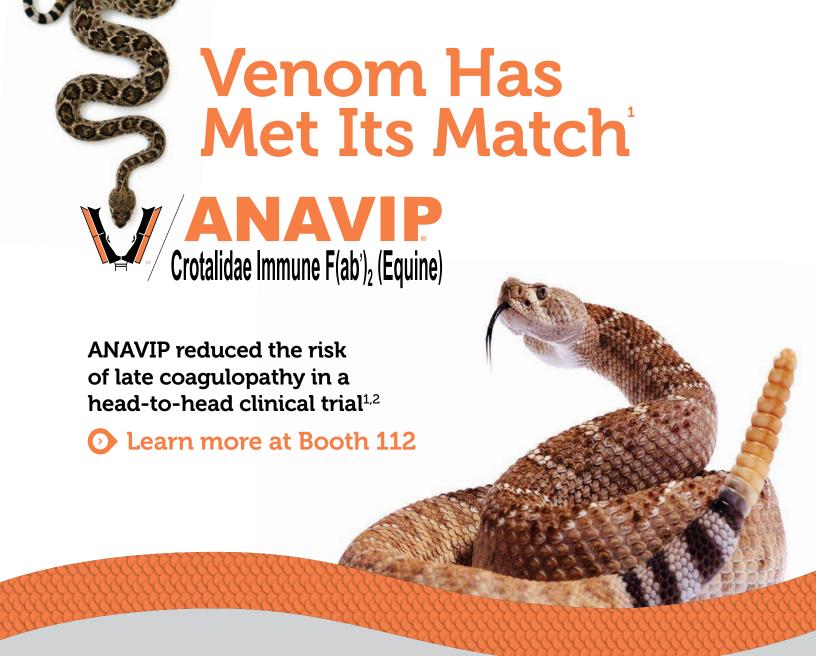
- COUNTON - CroFab®

Learn more at CroFab.com

Please visit us at **BOOTH #212**







IMPORTANT SAFETY INFORMATIONINDICATION

ANAVIP® (Crotalidae Immune F(ab')₂ (Equine)) is an equine-derived antivenin indicated for the management of adult and pediatric patients with North American rattlesnake envenomation.

CONTRAINDICATIONS

Mone

ADVERSE REACTIONS

The most common adverse reactions observed in more than 2 percent of patients in the clinical trials for ANAVIP were: pruritus, nausea, rash, arthralgia, peripheral edema, erythema, headache, myalgia, pain in extremity, and vomiting.

WARNINGS AND PRECAUTIONS Hypersensitivity

ANAVIP may cause allergic reactions.

Patients with known allergies to horse protein are particularly at risk for an anaphylactic reaction.

If signs or symptoms of anaphylaxis or hypersensitivity reactions (including urticaria, rash, tightness of the chest, wheezing, hypotension) occur, discontinue immediately and institute appropriate treatment.

Monitor patients with follow-up visits for signs and symptoms of delayed allergic reactions or serum sickness (rash, fever, myalgia, arthralgia, pruritus, urticarial rash) and treat appropriately if necessary.

Transmissible Infectious Agents

ANAVIP is made from equine (horse) plasma and may therefore carry a risk of transmitting infectious agents, e.g., viruses.

Reactions to Cresol

Trace amounts of cresol from the manufacturing process are contained in ANAVIP. Localized reactions and generalized myalgias have been reported with the use of cresol as an injectable excipient.



Click here for Full Prescribing Information for additional safety information







Poison Control Center: 1-800-222-1222
To report suspected adverse reactions,
call: 1-877-851-1902
To order ANAVIP, call: 1-866-830-7350

 Bush SP, Ruha A-M, Seifert SA, et al. Comparison of F(ab)₂ versus Fab antivenom for pit viper envenomation: a prospective, blinded, multicenter, randomized clinical trial. Clin Toxicol (Phila). 2015;53(1):37-45.

2. The efficacy analysis did not meet the pre-specified statistically defined superiority criterion. However, the percentages of subjects showing prespecified criteria for coagulopathic effect on either Day 5 and/or Day 8 were 10.3% and 5.3% in the Groups 1 and 2 when compared to 29.7% in Group 3 indicating efficacy of ANAVIP in management of coagulopathic effect in patients with North American rattlessake envenomation.

© Rare Disease Therapeutics, Inc. | ANV-DigAd-001 | Sept 2019 | HCPCS: J0841

Johnson Johnson

CONSUMER INC.

For information on
OTC safe medicine use & resources for
you & your patients, visit
GetReliefResponsiblyProfessional.com

Get Relief Responsibly® Professional Resource Center

Mark your 2020 Calendar Now For...

North American Congress of Clinical Toxicology



SEPTEMBER 10TH - 14TH
HYATT REGENCY

SAN FRANCISCO, CA

