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<th>SATURDAY, FEBRUARY 10, 2018</th>
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<tr>
<td><strong>Morning Session</strong> 8:00 AM - 1:00 PM</td>
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<tr>
<td>WORKSHOP #1 The Biosafety Program: A Road Map for Biosafety Professionals</td>
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<td><strong>Afternoon Session</strong> 1:00 PM - 5:00 PM</td>
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<td>WORKSHOP #7 Speaking Tips: Prepare, Organize and Present with Impact</td>
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<td>WORKSHOP #9 Establishing Effective Biocontainment Facility Performance Criteria</td>
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<td>WORKSHOP #12 Biosafety Program Analytics Workshop</td>
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<tr>
<td><strong>Opening Reception (5:00 PM - 6:30 PM)</strong></td>
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<th>MONDAY, FEBRUARY 12, 2018</th>
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<tr>
<td><strong>Welcome</strong> 8:00</td>
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<tr>
<td>Steve Monroe, PhD, CDC</td>
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<td><strong>Conference Overview</strong> 8:15</td>
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<tr>
<td>Paul Meechan, PhD, CDC Mary Ann Sondrini, EdM, Eagleson Institute</td>
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<td><strong>KEYNOTE:</strong> 8:30</td>
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<td>One Health: The Key to Making Health Security a Global Public Good Susan Corning, MS, BVSc, MRCVS, FRSPH, World Organization of Animal Health</td>
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<th>SESSION 1: ONE HEALTH CASE STUDIES</th>
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<tr>
<td><strong>Moderator:</strong> Paul Meechan, PhD, MPH, RBP, CBSP, Centers for Disease Control and Prevention</td>
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<tr>
<td><strong>9:30 Hantavirus: The Big Picture</strong></td>
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<tr>
<td>Barbara Knust, DVM, MPH, CDC</td>
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<td><strong>10:45 Select A, B, or C</strong></td>
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<tr>
<td>A Jennifer McQuiston, DVM, MS (CAPT, USPHS), CDC</td>
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<tr>
<td><strong>B</strong> Hanta &amp; Research (Field and Lab)</td>
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<td>Brian Amman, PhD, CDC</td>
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<tr>
<td><strong>C</strong> Hanta Epidemiology &amp; Lab Investigation</td>
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<td>Barbara Knust, DVM, MPH, CDC</td>
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<tr>
<td><strong>12:00 Lunch</strong></td>
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<td><strong>1:15 ABSA International Update</strong></td>
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<td>Patrick Condreay, PhD, ABSA President</td>
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<td><strong>1:30 Influenza: The Big Picture</strong></td>
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<td>Richard Webby, PhD, St. Jude</td>
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<td><strong>2:45 Select A, B, or C</strong></td>
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<td>A Biosafety and Occupational Health with Known and Unknown Influenza Strains</td>
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<tr>
<td>Zeke McKinney, MD, HealthPartners St. Paul</td>
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<tr>
<td><strong>B</strong> Influenza in Cats and Dogs, A Complex Interaction of Viruses</td>
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<tr>
<td>David Suarez, United States Department of Agriculture</td>
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<tr>
<td><strong>C</strong> Epidemiology of Influenza A Transmission From Swine to Humans at State Fairs</td>
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<tr>
<td>Andrew S. Bowman, MS, DVM, PhD Diplomate ACVPM, Ohio State University</td>
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MORE INFORMATION ONLINE AT EAGLESON.ORG/CDC
**SYMPOSIUM AGENDA**

**SPECIAL PRESENTATION**
4:00 The Planetary View of One Health  
Alex Dunlap, DVM, MD, CBSP, Former NASA

5:00 Conclusion

**TUESDAY, FEBRUARY 13, 2018**

8:00 Welcome

8:15 Advancing One Health Collaborations Globally Using CDC’s One Health Zoonotic Disease Prioritization Tool  
CDC One Health Office

**SESSION 2: EMERGING TECHNOLOGIES**
Moderator: Kalpana Rengarajan, PhD, MPH, JM, RBP, Emory University

8:45 Emerging Technologies in Public Health Labs  
Greg Armstrong, MD, CDC

9:30 Maldi-Tof and Biosafety Issues, Next Generation Sequencing  
Michael Perry, MS, MS Ed, Wadsworth Center

10:30 Patient Derived Xenographs  
Timothy Mandrell, DVM, DACLAM

11:15 Robotics/ High Throughput Screening  
Rich Rebar, GSK and Mary Sabolefski, MS, Novartis

12:00 Panel Discussion

12:30 Lunch

1:30 Poster Sessions

**SESSION 3: CULTURE OF SAFETY**
Moderator: Joseph Kozlovac, MS, RBP, CBSP SM(NRCM), USDA

2:30 What We Can Learn From Our Mistakes  
Natasha Griffith, CDC

3:00 A Roadmap to Safety Culture on a University Campus  
Mark McLellan, PhD, Utah State University

4:00 Culturology: One-oh-One Health  
Jim Welch, Elizabeth R. Griffin Research Foundation

4:30 Conclusion

6:00 Banquet (6:00 PM - 9:00 PM)

**WEDNESDAY, FEBRUARY 14, 2018**

8:00 Welcome

**SESSION 4: COMMUNICATION AND OUTREACH**
Moderator: Michael Pentella, PhD, University of Iowa

8:15 How to Communicate Risk When You Do Not Know Everything  
Thomas Kost, PhD, DTM (Distinguished Toastmaster), Former GlaxoSmithKline

9:00 Using Social Media to Communicate Science  
Tara Smith, PhD, Kent State University

Creating Tweets - Social Media as Safety Messaging System  
Jessica Schindelar, CDC

11:00 Update on WHO Biosafety Guidelines  
Kazunobu Kojima, MD, PhD, World Health Organization

11:20 Hot Topics

11:45 Gaps & Challenges - Call to Action

12:30 Conclusion
SATURDAY MORNING:

WORKSHOP #1: Saturday, February 10, 2018, 8:00 AM - 12:00 PM
The Biosafety Program: A Road Map for Biosafety Professionals
Benjamin Fontes, MPH, CBSP, Yale University
This new introductory course will provide a platform of information on the establishment of a biosafety program for a laboratory setting. Through lectures, case studies, and exercises, it will outline the core elements of a comprehensive biosafety program and demonstrate a proactive approach to the management of biohazards, including the roles and responsibilities of the institution, laboratory leadership, and the biosafety professional. Strategies for setting up and sustaining a biosafety program will be provided along with a review of the fundamental competencies needed for today’s biosafety professional. After taking the course, students will have a solid understanding of biohazard risk assessment and risk management from the institutional perspective.

WORKSHOP #2: Saturday, February 10, 2018, 8:00 AM - 12:00 PM
Sustainable Laboratories: Design for Biosafety, Biosecurity, Operations & Maintenance
Mark Fitzgerald, Soter Biocorp, Inc.
Natasha Griffith, MS, RBP, CDC
Jeffrey Owens, MPH, CSP, SN(NRCM), CBSP, Assoc. AIA, HDR
Architecture
Vibeke (Vips) Halkjaer-Knudsen, PhD, Sandia National Laboratories
This course offers a basic understanding of key principles underlying the design and operation of large animal facilities, the systems required to support a typical animal facility, how these influence facility design and how specialized systems enhance biosafety. The course will focus specifically on those facilities that do not fall under the US Select Agent regulations. Participants will be introduced briefly to laboratory design best practices as they relate to: building zoning, operational efficiency, and biosecurity factors, supporting good lab protocols and flexibility. They will learn how architectural, structural, HVAC (heating, ventilating and air conditioning), plumbing and electrical systems are influenced by laboratory designs. Through guided discussions and interactive exercises, participants will learn about the type of information required to design the systems, how services are distributed through a typical laboratory building and the type of redundant features required to keep facilities running. The course will be highly interactive with facilitated group discussions by the instructors.

WORKSHOP #3: Saturday, February 10, 2018, 8:00 AM - 12:00 PM
Integrating Biosecurity into Biorisk Management Systems: A One Health Perspective
Ryan N. Burnette, PhD, Merrick & Company
Donald Callihan, PhD, Merrick & Company
This course aims to provide an overview of strategic and tactical approaches to building biosecurity programs that support human, animal, or environmental health enterprises. Through discussion and group exercises, the course will provide detailed information on the functional components of an effective program needed to protect valuable biological materials of any type. It will also cover how to integrate biosecurity into existing biorisk management programs. The four major sections of the course will highlight:
1) The inherent differences between common elements of risk-based and threat-based assessments as they are used to analyze system wide vulnerabilities
2) The Five Pillars of Security as a framework for building an ISP program and how to use the ISP model to align existing institutional safety and security management systems with the security needs of biosafety programs
3) The resulting integrated model of biosafety and biosecurity management systems using case studies of public health and animal health systems
4) A participatory exercise that will simulate potential biosecurity threats to test the functionality of biosecurity programs designed during this workshop

SATURDAY AFTERNOON:

WORKSHOP #4: Saturday, February 10, 2018, 1:00 PM - 5:00 PM
Can You Hear Me When I Speak?
Jonathan Richmond, PhD, Biosafety Consultant
Judith Ann Pauley, PhD, Process Communications, Inc.
Joseph F Pauley, Kahler Communications
One major pillar of biosafety communication is the assurance that critical information is effectively understood. It applies during educational courses, interactions with workers throughout the biomedical community, and stressful meetings with the public/press/regulators/inspectors/etc. Through interactive discussion, this course focuses on skill-building in oral communication situations and will teach the key psychological clues that will allow you to present your messages to a more receptive listener. It will prepare you to present important messages in both face-to-face and speaker/audience environments. “It’s not what you say, it’s how you say it.”

WORKSHOP #5: Saturday, February 10, 2018, 1:00 PM - 5:00 PM
Employing Competencies to Enhance Laboratory Biosafety
Michael Pentella, PhD, University of Iowa
Multiple national professional organizations, including CLMA, ASCLS and APHL, have endorsed competency development as a means of strengthening the laboratory workforce. Competencies improve the workforce by providing a framework for developing education and training programs, identifying worker roles and job responsibilities, and assessing individual performance and organizational capacity. Competency assessment assures that the laboratory personnel are fulfilling their duties as required by federal regulation. This course will focus on the implementation of biosafety competencies. This session will consist of both lecture and a hands-on exercise to introduce participants to the writing of biosafety competencies based on the risk assessment. Participants will first be introduced to biosafety competencies and learn how biosafety competencies enhance the culture of biosafety and the biosafety plan. Next, the participants
will break into workgroups and review an SOP and risk assessment. The workstations represent different laboratory tasks typically found in a laboratory: Molecular testing, HIV serology, AFB testing, MALDI identification, and Blood Cultures.

**WORKSHOP #6: Saturday, February 10, 2018, 1:00 PM - 5:00 PM**

**Disinfection and Decontamination**

Paul Meechan, PhD, MPH, CBSP, CDC  
Aaufa Aranjo, PhD, MSc, CDC  
Kristin Long, PhD, North Carolina Department of Health and Human Services

This course provides an introduction into the benefits and issues which may arise with the use of specific disinfection and decontamination agents. Particular emphasis will be on the operation of autoclaves and the options available to achieve adequate decontamination through their use. Chemical disinfection options and space decontamination options will be explored as both a means of waste decontamination and space decontamination. Class exercises will be designed to engage the participants and allow them to identify options which may be suitable for their specific needs.

**SUNDAY MORNING:**

**WORKSHOP #7: Sunday, February 11, 2018, 8:00 AM - 12:00 PM**

**Speaking Tips: Prepare, Organize and Present with Impact**

Thomas Kost, PhD, DTM (Distinguished Toastmaster) – Former GlaxoSmithKline

This course is designed to provide attendees with proven tools for preparing, organizing and presenting effective talks to a variety of audiences. Through a combination of lecture and audience participation, attendees will gain confidence and enhance their speaking skills. Lectures will provide Tips for preparing, organizing and presenting effectively with an emphasis on successfully connecting with diverse audiences. Attendees will have an opportunity to engage in discussions and exercises focused on developing biosafety related presentations, designing effective PowerPoint slides and extemporaneous speaking.

**WORKSHOP #8: Sunday, February 11, 2018, 8:00 AM - 12:00 PM**

**A Moving Target: The Human Factor in One Health Research and Response**

Authors: Sarah Genzer, DVM, CDC  
Nicole Lukovsky, DVM, DACLAM, CDC  
April M. Clayton, PhD, CDC  
Julian Jolly, PharmD, CDC  
George Lathrop, DVM, DACLAM, CDC  
Nathaniel Powell, Jr., DVM, DACLAM, CDC

One Health aims to appreciate and dissect the complex interactions between humans and animals. These dynamic interfaces may occur in a biocontainment (i.e., laboratory) or field (i.e., environmental) setting. Multidisciplinary teams involving scientists, veterinarians, animal care staff, epidemiologists, and safety personnel are key to achieving excellence in One Health-centered research and responses. This workshop will focus on the impact of the human factor in animal research facilities and public health responses involving zoonoses. Topics addressed include: the design and execution of occupational risk management programs to identify risk “hot zones” and hazards in animal biocontainment spaces; America’s opioid epidemic and its effect on animal research, particularly how this epidemic is creating issues with DEA licensing, personnel accountability, and animal pain management; introduction of animals into biocontainment that may be natural reservoirs for novel infectious agents and surrounding challenges regarding screening of these agents and safety of personnel; and the importance of veterinary health professionals interfacing with the public during disasters and outbreaks of zoonotic significance. This interactive workshop will include case studies to foster discussion around each topic and opportunities to handle selected animal and personal protective equipment (PPE), including donning and doffing of PPE, used in biocontainment laboratories and field operations.

**WORKSHOP #9: Sunday, February 11, 2018, 8:00 AM - 12:00 PM**

**Establishing Effective Biocontainment Facility Performance Criteria**

John Henneman M.S., RBP, Kansas State University  
Dan Cook, LEED AP, Cornerstone Commissioning

Well operating biocontainment facilities require more than just routine operations and maintenance. Whether starting up a new facility, renovating an older one, or revising current operation procedures, the details discussed in this class will provide guidance to stay on track with the project. After the initial commissioning, annual verification of the facility is essential for safe operations. This course will include discussion of when to start the process, how to start the process, facility functions, documenting the criteria, some lessons learned and suggestions for maintaining communication along the way.

**SUNDAY AFTERNOON:**

**WORKSHOP #10: Sunday, February 11, 2018, 1:00 PM - 5:00 PM**

**The 4 Cs of Effective Communication: Using Language That is Clear, Concise, Creative and Compelling**

Margy Lambert, PhD, US Department of Health & Human Services

How do you get key biosafety messages across to your stakeholders? Communicating effectively is imperative regardless of the type of audience, method of communication or specific message that you are trying to convey. Using language that is Clear, Concise, Creative, and Compelling (the 4 Cs) is an approach that is highly effective in bringing your message home. This course will provide a road map for crafting effective communications using the 4 Cs as a guide. A series of exercises will be used to summarize common mistakes made in written and oral communications and to illustrate ways to fix those mistakes by using the 4 Cs concept. The instructor is a health scientist and biosafety professional with more than 16 years of experience in communicating about biosafety topics.
WORKSHOP #11: Sunday, February 11, 2018, 1:00 PM - 5:00 PM
International Biocontainment Challenges
Mark Fitzgerald, Soter Biocorp., Inc.
Natasha Griffith, MS, RBP, CDC
Jeffrey Owens, MPH, CSP, SN(NRCM), CBSP, Assoc. AIA, HDR Architecture
William Arndt, PhD, Sandia National Laboratories
This course will begin with a brief review of the key principles underlying the design features of containment laboratories. Participants will be introduced to and have a discussion on the differences in prescriptive and performance based requirements. A discussion will be held on the common biocontainment challenges; participants should come prepared to share their experiences and challenges. In addition to examples provided by the instructors, participants will be able to learn from the experiences of everyone in the room and will help identify possible solutions to challenges shared by other participants. The course will include lecture, pictures of many examples of biocontainment challenges from around the world, and small group activities analyzing case studies and developing alternate solutions. The goal of this course is to give students confidence in using critical thinking skills to tackle problems in biocontainment facilities in lower resource settings.

WORKSHOP #12: Sunday, February 11, 2018, 1:00 PM - 5:00 PM
Biosafety Program Analytics Workshop
Robert Emery, DrPH, CHP, CIH, CSP, CBSP, CHMM, CPP, ARM, University of Texas
Scott Patlovich, DrPH, CBSP, CHMM, CPH, University of Texas
All biosafety programs are confronted with three operational “truisms”:
1) Successful biosafety programs function largely in the realm of prevention, so programs need to be adept at objectively demonstrating the amount of resources that are necessary to “make nothing happen”, such as injuries, illnesses and exposures.
2) What gets measured gets managed effectively.
3) Comparison is the “mother of insight” for administrators
This workshop will address these issues through the active engagement of participants to begin to answer some critical questions plaguing the biosafety community, such as: What are the key institutional drivers that influence biosafety program resourcing? Where might this data reside and how might it be assembled for optimal analysis and interpretation? What parameters should biosafety programs be collecting beyond those for regulatory compliance? What types of comparisons might be possible and valid? Participants in the workshop are asked to come prepared with the types of data they collect for their programs and to actively engage in the dialogue so that the collective knowledge of the group can be leveraged.

WORKSHOP #13: Sunday, February 11, 2018, 1:00 PM - 5:00 PM
Thinking Outside the Box: Innovative Ideas on High Containment Operations, Management, Animal Care and Training
Kazunobu Kojima, MD, PhD, World Health Organization
HOTEL INFORMATION

The Crowne Plaza Ravinia is located in the heart of Atlanta’s Perimeter Center, across the street from the Perimeter Mall. It is surrounded by ten acres of lush Japanese Gardens containing walking trails.

Amenities include: high-speed internet access in all room, an indoor pool and health club, and three restaurants. In addition, the hotel provides complimentary shuttle service to the MARTA train station. The MARTA provides continuous transportation to and from the airport, as well as a variety of other Atlanta locations.

A block of rooms has been reserved at the special rate of $148.

To make reservations, call +1(770) 395-7700 or visit www.eagleson.org/CDC for a link to the hotel’s room registration website. Please indicate that you will be attending the CDC Biosafety Symposium. Reservations must be received by January 26, 2018.

OPENING RECEPTION
Sunday - 5:00-6:30 PM

BANQUET
Tuesday - 6:00-9:00PM

REGISTRATION INFORMATION

SYMPOSIUM FEES: Fees include: Opening Reception, Symposium Banquet, attendance at Symposium sessions and lunch on Monday and Tuesday

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<th>FEES</th>
<th>By January 12, 2018</th>
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<tr>
<td>Symposium</td>
<td>$795</td>
<td>$865</td>
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<tr>
<td>4 Hour Presymposium Workshop</td>
<td>$295</td>
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REGISTRATION INFORMATION: To register for this symposium online, please go to www.eagleson.org/CDC or call +1 (207) 490-1076 to register by phone or request a registration form.

CANCELLATION POLICY: Individuals who cancel more than 15 business days prior to the class date will be given a full refund. For cancellations made 6 to 15 business days before the start of the program, a 50% refund will be given. For cancellations made 5 business days or less prior to the class date, no refunds will be given. Notification of cancellation must be received in writing. Substitutes for a registered attendee may be made at any time.