

Dual RNA-Seq for The Analysis of Host-Pathogen Interactions in a Model of *A. Baumannii* Infection
Jennifer Grier (UofSC)

Workshop: Genomic Analysis in R
Homayoun Valafar (UofSC)

S5. Bionanomaterials Core | Lincoln
Moderator: Qian Wang (UofSC)

The Challenge and Opportunities of Big Data in Nanomaterials for Energy Conversion and Storage
Frank Chen (UofSC)

Cross-scale Computer Modeling for Bionanomaterials Engineering
Ming Hu (UofSC)

Deep Learning for Pattern Discovery and Predictive Modeling: Opportunities and Issues
Jian Jun (UofSC)

Nanopore Biosensor as An Alternative Peptide Sequencing Tool
Chang Liu (UofSC)

The Challenge of Data Processing in Bionanomaterials Engineering
Qian Wang (UofSC)

Parallel Sessions
3:30pm – 5:30pm

S6. NIH Grantee Session | Richland A
Moderator: Xiaoming Li (UofSC)

Missed Opportunities for Early HIV Diagnosis in South Carolina
Sharon Weissman (UofSC)

Findings from Machine Learning Techniques for Predictive Modeling of PLWH Retention in-care
Bankole Olatosi (UofSC)

Knowledge-infused AI for Healthcare: Role of Conceptual Medical Knowledge in Improving Machine Understanding
Manas Gaur (UofSC)

Modeling Influential Neighbors in Social Networks of Young MSM: An Application of Graph Attention Networks to Predict and Track HIV Infection
Cui Tao (University of Texas Health Science Center at Houston)

NIAID Vision and Funding Priority in Data Analytics
Carlie Williams & Rosemary McKaig (NIH/NIAID)

S7. SC RFA Data Workshop | Richland B
Accessing Data Held by SC Revenue & Fiscal Affairs
Moderator: David Patterson (SC RFA)

S8. Workshop | Hall of Fame
Developing a Secure, HIPAA Compliant Research Computing Environment
Neset Hikmet (UofSC)

S9. SAS Workshop | Richland C
3:30pm – 6:15pm

Day 3: Tuesday, February 11

Breakfast | Lexington
7:30am – 8:30am

Plenary Session | Lexington
Moderator: Kolby Redd (UofSC)

The SC Integrated Data System: Overview and Healthcare Examples
8:30am – 9:30am
David Patterson (SC RFA)

Using Data to Inform Care Delivery
9:30am – 10:30am
Cathleen Bennett (New Jersey Hospital Association)

Doing Big Things with Your Data
10:30am – 11:00am
Penny Cooper (Augusta Health in VA)

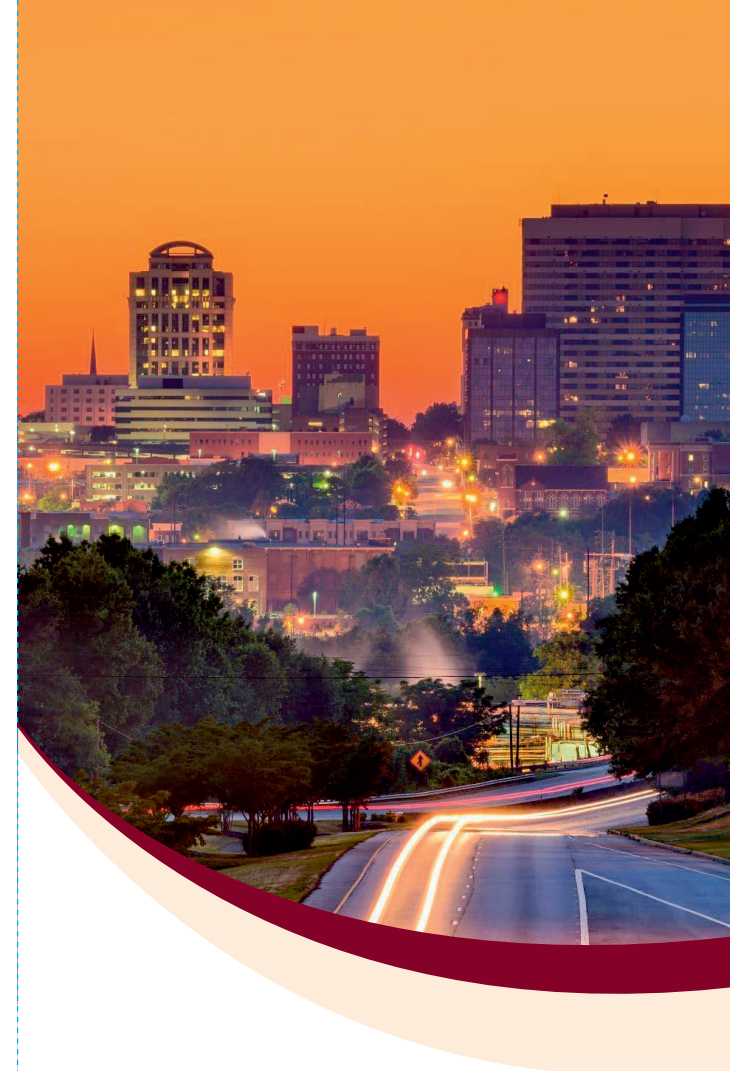
Big Data Analytics and Applied Data Science within Geisinger's Large Integrated Health System
11:00am – 12:00pm
Brandon Fornwalt (Geisinger Health System)

Lunch | Lexington
12:00pm – 1:00pm

Using Data to Advance Knowledge in Healthcare: Historical Challenges and the Small Data Problem
12:00pm – 1:00pm
Paul Gerrand (Palmetto GBA)

Closing remarks | Lexington
1:00pm – 1:15pm

Les Hall, Executive Dean, UofSC School of Medicine-Columbia;
CEO, Palmetto Health-UofSC Medical Group



UofSC BDHSC National Big Data Health Science Conference 2020

February 9-11, 2020 | South Carolina Convention Center, Columbia, SC

Program Booklet

Day 1: Sunday, February 9

Pre-conference: SAS Workshop | Lexington

11:00am – 1:45pm

Plenary Session | Lexington

Moderator: Bankole Olatosi (UofSC)

Opening Welcome Remarks

2:00pm – 2:15pm

Thomas Chandler, Dean UofSC Arnold School of Public Health

Student Case Competition Award Announcement

2:15pm – 2:30pm

Electronic Medical Documentation

Interoperability (EMDI) Initiative

2:30pm – 3:30pm

Pallavi Talekar (CMS/EMDI)

Object Oriented Data Analysis

3:30pm – 4:30pm

James Marron (University of North Carolina)

The Face of Big Data and Analytics in Health-The Patient Journey

4:30pm – 5:30pm

Steve Kearney (SAS)

American College Healthcare Executives (ACHE)

Dinner & Panel Session | Richland A B

*By invitation only

5:30pm – 7:30pm

Moderator: Dianne Davis (SC RFA)

Day 2: Monday, February 10

Breakfast | Ballroom A

8:00am – 9:00am

Poster Session | Ballroom A Prefunction

8:00am – 6:00pm

(Author presence: 8:00am – 9:00am)

Plenary Session | Ballroom A

Moderator: Xiaoming Li (UofSC)

Opening Welcome Remarks

9:00am – 9:15am

Robert L. Caslen Jr., President, UofSC

Enable a FAIR Data Ecosystem

9:15am – 10:15am

Susan Gregurick (NIH)

Overcoming Barriers to the Adoption and Implementation of Predictive Modeling and Machine Learning in Clinical Care: What Can We Learn from US Academic Medical Centers?

10:15am – 11:15am

Eric Poon (Duke Health)

Causality and Prediction from Electronic Health Records Data

11:15am – 12:15pm

Joseph Hogan (Brown University)

Lunch | Ballroom A

12:15pm – 1:15pm

How Bits, Neurons and Qubits Will Shape The Future of AI in HealthCare

12:15pm – 1:15pm

Theodore Tanner Jr. (IBM Watson Health)

Parallel Sessions

1:30pm – 3:30pm

S1. Electronic Health Records Core | Richland A

Moderator: Jiajia Zhang (UofSC)

Evaluating and Comparing Machine Learning Algorithms in Predicting 30-day and 1-year Mortality Risk among Geriatric Hip Fracture Patients

Farica Zhuang (Duke University)

Causal Influence in the Real World

Yang Zhao (Nanjing Medical University)

Quality of Life and Disease Management in Elderly Patients with Cardiovascular Diseases in China

Hui Lu (Nanjing Medical University)

Association of Longitudinal Patterns of CD4, Viral Load and Non-AIDS Related Cancer

Shujie Chen (UofSC)

Using Big Data to enhance HIV Case Management and Patient navigation in South Carolina

Ali Mansaray (SC DHEC)

S2. Geospatial Core | Richland B

Moderator: Jan Eberth (UofSC)

Leveraging Social Media Data for Disaster Management: Challenges and Applications

Zhenlong Li (UofSC)

Hazards and Vulnerability in South Carolina: Geospatial Approaches to Preparedness, Response, Recovery, and Mitigation

Susan Cutter (UofSC)

Geographic Organization of Trauma System Resources: Where You Get Hurt Matters

Joshua Brown (University of Pittsburgh Medical Center)

Geospatial Data and Analysis in Humanitarian Crises: Leveraging Spatially-Related Disciplines for Population Health

Paul Gregg Greenough (Harvard Medical School)

S3. Social Media Core | Richland C

Moderator: Amir Karami (UofSC)

Understanding Human Mobility Pattern During Hurricane Evacuation with Social Media

Yueqin Jiang (UofSC); Zhenlong Li (UofSC); Susan Cutter (UofSC)

Characterizing Diet Discussions on Reddit

Victoria Money (UofSC); Amir Karami (UofSC)

Sharing Health and Medical Scholarly Articles On Facebook

Ehsan Mohammadi (UofSC); Karl B. Gregory (UofSC); Mike Thelwall (University of Wolverhampton)

Characterizing Health Tweets: LGB vs Transgender Individuals

Frank Webb (UofSC); Amir Karami (UofSC)

Panel Discussion: Social Media and Health: Challenges, Opportunities, and Future Directions

Brie Turner-McGrievy (UofSC); Courtney Monroe (UofSC); Robert McKeever (UofSC); Brooke McKeever (UofSC)

S4. Genomics Core | Hall of Fame

Moderator: Homayoun Valafar (UofSC)

Drugs Repurposing for The Treatment of HIV-Associated Neurocognitive Disorder by AI-based Literature Mining

Michael Shitman (UofSC)

Leveraging Sequencing Technologies to Identify Genomic Alterations

Nathan Hancock (UofSC)