10th National Conference on Laboratory Aspects of Tuberculosis

MONDAY, APRIL 17
Registration: 4:00 pm – 7:00 pm
Poster Setup: 4:00 pm – 7:00 pm

TUESDAY, APRIL 18
Registration 7:00 am – 4:30 pm
NTCA Meetings 7:00 am – 6:30 pm
Exhibit Hall 12:00 pm – 6:30 pm
Poster Viewing 7:00 am – 6:30 pm

8:00 am-9:30 am
Opening Session and Keynote
Welcome to the 10th National Conference on Laboratory Aspects of Tuberculosis. The Chair of the Conference Planning Committee will welcome everyone including our two featured speakers. We will first hear some opening remarks from the Director of the Division of Tuberculosis Elimination (DTBE) at the Centers for Disease Control and Prevention. The keynote address will be provided by Dr. Timothy Rodwell, Assistant Professor at UCSD and a Senior Scientific Officer at the Foundation for Innovative Diagnostics (FIND).

Welcome to the 10th National Conference on Laboratory Aspects of TB
Paula M. Vagnone, MT(ASCP), Minnesota Department of Health

Opening Remarks
Philip LoBue, MD, FACP, FCCP, Division of Tuberculosis Elimination, CDC

Diagnosing and Treating Drug Resistant TB in the 21st Century using NGS and Intelligent Decision Support Tools
Timothy Rodwell, MD, PhD, MPH, University of California at San Diego and Foundation for Innovative Diagnostics (FIND)
9:30 am-10:00 am
Morning Break

10:00 am – 11:45 am
Is there a better way to do this: A snapshot a few TB laboratory workflows!
Do you wonder if there is a more efficient way to run your TB Lab? Perhaps you want to finally put your HPLC to rest and are wondering how to implement your new MALDI most effectively into your workflow or thinking about the line probe assay, but are not sure how it works. Come to this session to learn how a few states organize their workflow utilizing a variety of different methods, including PCR, MALDI, and the line probe assay, and how one state went through a LEAN project to make improvements.

Moderator: Ryan Jepson, State Hygienic Laboratory at the University of Iowa

Cart off the Savings with Lean
Jennifer Eastman, Ph.D., HCLD/TS(ABB), Alaska State Public Health Laboratory

It’s the Massachusetts Way: Using the MALDI-TOF to identify Mycobacteria species
Tracy Stiles M(ASCP), William A Hinton State Laboratory Institute (Massachusetts)

Is this Heaven?! No-It’s identification of Mycobacteria sp. from culture using PCR!
Ryan Jepson, State Hygienic Laboratory at the University of Iowa

The Line Probe Assay – Another Option for Mycobacterium sp. Identification
Paula M. Vagnone, MT(ASCP), Minnesota Department of Health

11:45 am – 1:00 pm
Lunch (on your own)
1:00 pm – 2:30 pm
**The Times They Are-a-Changin’—Updates in Drug Susceptibility Testing of Mycobacterium tuberculosis**

*Drug susceptibility testing for MTBC can be challenging for a laboratory. This session examines different approaches and aspects of providing reliable DST results, and highlights emerging concepts in improved service delivery.*

Moderator: Frances Tyrrell, MT (ASCP), Centers for Disease Control and Prevention

- **Improving MGIT PZA Susceptibility Testing – A Multi-laboratory Evaluation of Alternative Inoculum Dilutions**
  - Glenn Morlock, MS, Centers for Disease Control and Prevention

- **MIC = Many Inherent Challenges**
  - Marie-Claire Rowlinson, PhD, D(ABMM), Florida Bureau of Public Health Laboratories

- **Updates to the CDC MDDR Service**
  - Beverly Metchock, DrPH, D(ABMM), Centers for Disease Control and Prevention

- **A Review of the National TB DST Reference Center**
  - Anne M. Gaynor, PhD, Association of Public Health Laboratories

2:30 pm-3:00 pm
**Afternoon Break**

3:00 pm-4:45 pm
**Highlighting the Work in our PHLs**

*This session will highlight the findings of a few selected outstanding submitted poster abstracts that have broader lessons to be shared with the conference. We may also provide a short preview to the poster session with short presentations from the other poster presenters.*

Moderator: Paul Zell, MPH, Association of Public Health Laboratories

- **Pending abstract review and selection**
  - Speakers TBD

5:00 pm-6:30 pm
**Poster Session**
**WEDNESDAY, APRIL 19**

**Registration** 7:00 am – 4:30 pm  
**NTCA Meetings** 7:00 am – 5:30 pm  
**Exhibit Hall** 8:00 am – 6:30 pm  
**Poster Viewing** 7:00 am – 5:30 pm

**7:00 am-8:00 am**  
**Batman versus Superman: Dawn of the TB Laboratory in 2017**  
*Both Batman and Superman fight crime but do it in different ways. There is no one algorithm that fits all approach in TB testing. Factors such as personnel, workload volume, specimen transport, specimen type, instrumentation available and expertise all affect what algorithm you may currently use or are moving to in the future. Please join us for a discussion group on your TB experiences and can we learn a better way of providing quality information in the age of diminishing personnel/funds. We encourage all to come share their experiences.*

Co-Moderator: Mary Robin Connelly, MMSc, Georgia Public Health Laboratory  
Co-Moderator: Denise Dunbar, Texas Department of State Health Services

**8:00 am-10:00am**  
**Molecular Testing: Keeping up with the Joneses or performing appropriate testing?**  
*In a time when so many new technologies are emerging it can be hard to know what is right or necessary for your laboratory. Balancing the need to keep up with performing appropriate testing this session will focus on providing practical information related to the use of molecular testing methods in the TB laboratory. Each speaker will address the processes for decision making and/or implementing the given method to help other laboratories think through their own decision making and ensure it is appropriate to meet their own needs.*

Moderator: Jafar H Razeq PhD, HCLD (ABB), Katherine A. Kelley Public Health Laboratory (Connecticut)

**Considerations for the use of Next Generation Sequencing in the TB Laboratory**  
Kelly Wroblewski, MPH, Association of Public Health Laboratories  
Lauren Cowan, PhD, Centers for Disease Control and Prevention

**Implementing Whole-Genome Sequencing on Clinical Isolates of Mycobacterium tuberculosis Complex in New York**  
Kimberlee A. Musser, PhD, Wadsworth Center, New York State Department of Health
Perspective from an APHL/CDC TB Whole Genome Sequencing Pilot Lab
Speakers TBD

Alternative Specimen Types for TB Identification using Xpert MTB/RIF
Paula L. Gibbs, MT(ASCP), Tennessee State Department of Health

10:00 am-10:30 am
Morning Break

10:30 am-11:45 am
Exploring Developments in TB Research
This session will have speakers presenting on their latest research and findings related to TB diagnostics, drug resistance and the impact of updated treatment regimens on laboratory testing.

Moderator: Ailyn Pérez-Osorio PhD, Washington State Department of Health

Acquired Resistance to New TB Drugs (Delaminid and Bedaquiline)
Sebastian Gagneux, Swiss Tropical and Public Health Institute

A New Paradigm for the Pathogenesis of Pulmonary Tuberculosis
Robert Hunter, University of Texas Health Sciences Center

Updates from the CDC Applied Research Team
James E. Posey, PhD, Centers for Disease Control and Prevention

11:45 am-1:00 pm
Lunch

1:00 pm-2:30pm
A Tale of Two Reports: The Trends Manuscript and Aggregate Report

CDC Laboratory Consultants will present public health laboratory TB testing volumes, methods, and turnaround time aggregate data and trends based on TB cooperative agreement reports.

Moderator: Stephanie P. Johnston, MS, Centers for Disease Control and Prevention
US PHL Trends in MTBC Testing 2009-2013
Frances Tyrrell, MT (ASCP), Centers for Disease Control and Prevention

CDC Aggregate Report 2012-2015
Monica Youngblood, MPH, Centers for Disease Control and Prevention

2:30 pm-3:00 pm
Afternoon Break

3:00 pm-5:00 pm
TB Case Studies: Lessons from the Field
This session will have several interesting case presentations which highlight the complexity of TB testing. The presentations will walk you through the case with interactive questions throughout to enable you to see how you would do if you had the case in your laboratory.

Moderator: TBD

TBD

5:00 pm- 5:30 pm
Closing Remarks and Conference Conclusion
Paula M. Vagnone MT(ASCP), Minnesota Department of Health

A short wrap-up of the major topics and new information covered in the conference by the Conference Planning Committee Chair.
THURSDAY APRIL 20

NTCA Meetings 7:00 am – 5:15 pm

2017 NTCA Conference-Day 2

8:00 am-9:30 am
Working With Lab Partners: False Positives and Reference Labs
Moderator: Diana Fortune, National TB Controllers Association

9:30-10:15 am
Morning Break