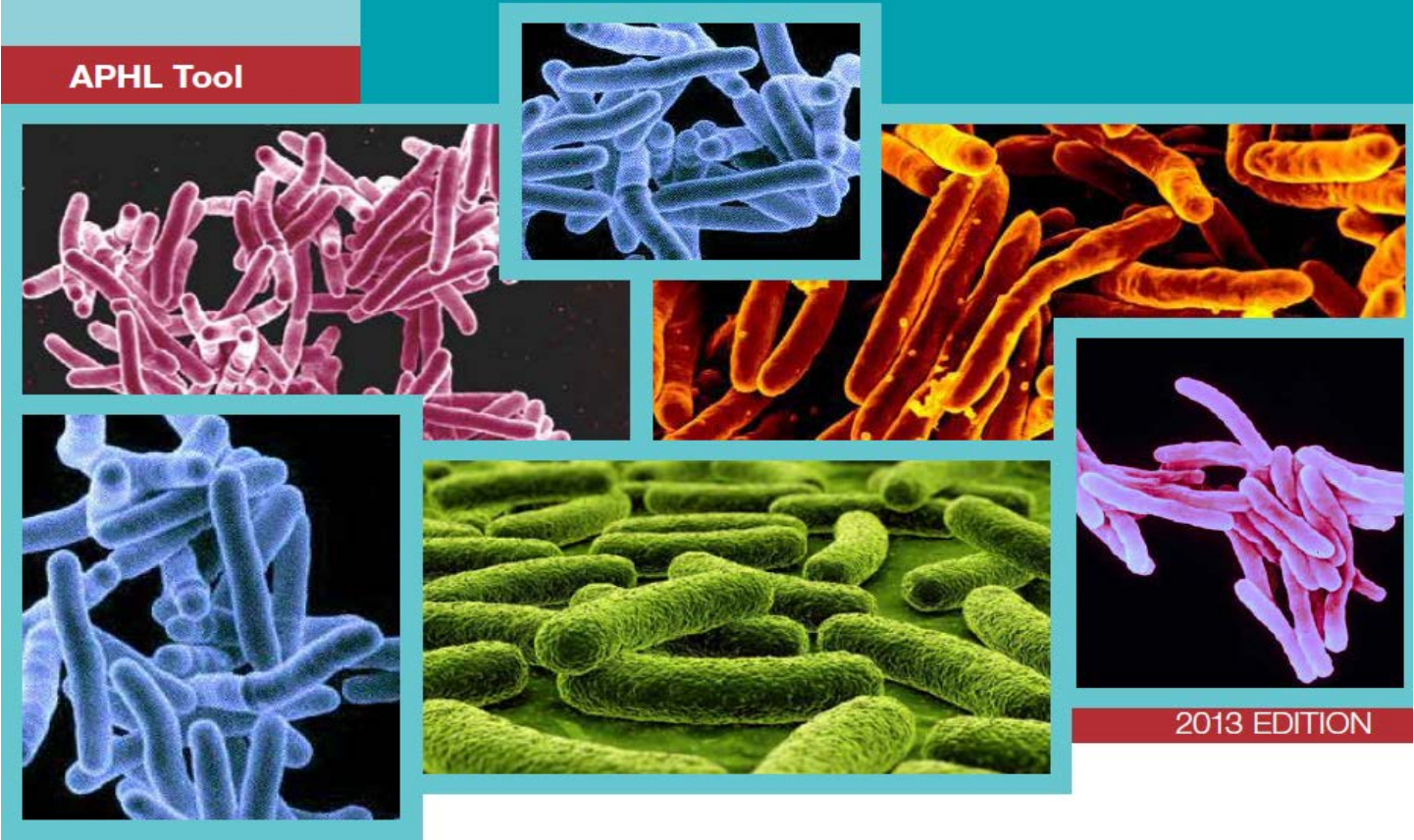


# *Mycobacterium tuberculosis*: Assessing Your Laboratory

APHL Tool



2013 EDITION

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# Audience

- ***Mycobacterium tuberculosis: Assessing Your Laboratory*** is intended for laboratories that perform TB testing in the United States
  - Clinical/Hospitals
  - Public health
  - Commercial
- Tool written by representatives of U.S. clinical, public health, and commercial laboratories

# Versions

- 1995
  - Liquid culture
  - Rapid culture ID
- 2009
  - Major revision
  - Molecular detection of Mtb & drug resistance
  - Online version available through APHLs TB Homepage
- 2013
  - Molecular and bibliography update

# What does the Tool Assess?

- Designed to be a self-assessment tool
- Assists in assessing the quality of TB diagnostic practices
- Scores are not compiled
- Information is intended for your laboratory's own self-improvement
- Intended to provide information on best-practices in the laboratory

# How does the Tool Work?

The tool consists of a series of 94 questions (yes/no/na) divided into the following sections:

- General Specimen Collection and Handling
- Safety
- General Laboratory Practice
- Smears from Clinical Specimens
- Public Health and Epidemiology
- Specimen Processing and Decontamination
- Inoculation and Growth Detection
- Susceptibility Testing
- Direct Detection

# How does the Tool Work?

- Laboratories answer only the questions in the sections that correspond with services that their mycobacteriology laboratory provides
- Suggested that several individuals within the mycobacteriology laboratory participate in the self-assessment process

# Questions & Guidance

- All questions answered with Yes, No, or Not Applicable
- Critical Questions
  - Yellow Questions (n=5) – A negative answer to a yellow question indicates a gap in the quality systems of the laboratory.
  - Red Questions (n=19)– A negative answer to a red question indicates a severe gap in safety or quality
- All questions include guidance with explanation and references

## Once you finish using the tool, what is the end product? How can you use the end product?

- Opportunity to review procedures
- Utilize targeted guidance and references provided for each question
- Assign priorities and adopt a plan to update and improve laboratory practices as needed
- The addition of the electronic version allows APHL periodic analysis of user performance which is useful for the development of future TB laboratory training tools



# Next Steps for the Tool and Lessons Learned

- Future Updates:
  - With the emerging technologies being utilized in the laboratory (MALDI-TOF, Xpert), best practices will need to be reassessed and incorporated.
  - As the advancement in rapid access molecular testing begins to alter the TB diagnostic landscape, the resulting effects on testing programs will need to be addressed in future editions
- Laboratories prefer flexibility of using hard copy version of the tool. How can the online version be modified or utilized better to capture trends?

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