## **About CDC's Antibiotic Resistance Lab Network**

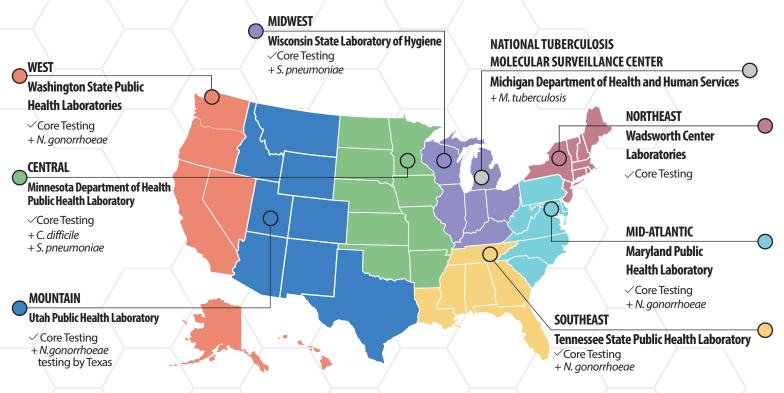
The Antibiotic Resistance Lab Network (AR Lab Network) supports nationwide lab capacity to rapidly detect antibiotic resistance in healthcare, food, and the community, and inform local responses to prevent spread and protect people. The AR Lab Network includes seven regional labs, the National Tuberculosis Molecular Surveillance Center (National TB Center), and labs in 50 states, four cities, and Puerto Rico. As a whole, the network tracks changes in resistance and helps identify and respond to outbreaks faster.

## AR Lab Network Regional Labs & National Tuberculosis Molecular Surveillance Center 2019–2020

Every regional lab does core testing. Select labs provide additional testing to support nationwide needs.

The National TB Center is equipped to perform whole genome sequencing (WGS)

for isolates of *Mycobacterium tuberculosis* in the U.S.



## **Core Testing by all regional labs:**

- Molecular testing to detect colonization of carbapenem-resistant Enterobacteriaceae (CRE).
- Detection of new and emerging threats, like novel carbapenemase genes, and ability to detect changes to known threats, like methicillinresistant *Staphylococcus aureus* (MRSA).
- Isolates may be used for the CDC and FDA AR Isolate Bank and WGS projects.
- ✓ Fungal susceptibility of *Candida* species to identify emerging resistance.
- Identification and colonization screening to detect and help prevent spread of Candida auris (C. auris).
- Perform expanded susceptibility testing to determine if new drugs or drug combinations will be effective to treat patients infected with especially rare resistant pathogens.

## Additional Testing by some regional labs and the National TB Center:

- + Clostridioides difficile special projects.
- + Enhanced detection of drug-resistant *Neisseria* gonorrhoeae using reference testing method and WGS.
- + Antimicrobial susceptibility and serotyping of multidrug-resistant *Streptococcus pneumoniae*.
- + Perform WGS for all isolates of *Mycobacterium tuberculosis*.

The Core and Additional Testing complements lab capacity supported by CDC in every state, four cities, and Puerto Rico.

