



Indiana
Department
of
Health

TUBERCULOSIS AND REFUGEE HEALTH PROGRAMS

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NBS/Surveillance

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Tuberculosis

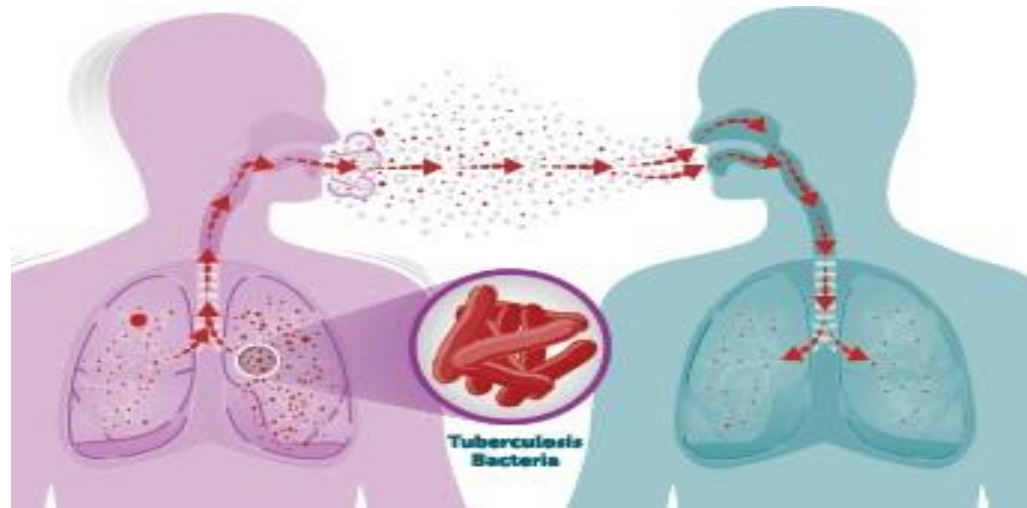
- Tuberculosis (TB) is caused by the bacterium *Mycobacterium tuberculosis*
- Usually affects the lungs, but can attack any part of the body
- Divides at a slow rate



How does TB spread?

TB is spread from person to person through the air or by other means of aerosolization that could occur in different scenarios such as wound care.

- TB bacteria are released into the air when a person with TB disease of the lungs or throat coughs, sneezes, speaks, or sings
- People nearby may breathe in these bacteria and become infected



Depending on the environment, particles can remain in the air for several hours

TB Signs and symptoms

- Signs and symptoms?
 - Cough greater than three weeks
 - Illustration to the right shows other possible symptoms

Think TB...Test for TB

LONG-TERM
COUGH



FEVER



FATIGUE



CHILLS



WEIGHT LOSS



NIGHT SWEATS



COUGHING UP
BLOOD



NO APPETITE



CHEST PAIN



Patients may have one or more of these signs and symptoms.

LTBI Compared to TB Disease

Person with LTBI	Person with TB Disease
Has a small amount of TB bacteria in their body that are alive but inactive	Has TB bacteria that are active in their body
Cannot spread TB bacteria to others	May spread TB bacteria to others
Does not feel sick	May feel sick and may have symptoms such as a cough, fever, and/or weight loss
Usually has a positive TB skin test or TB blood test result indicating TB infection	Usually has a positive TB skin test or TB blood test result indicating TB infection
Chest radiograph is typically normal	Chest radiograph may be abnormal
Sputum smears and cultures are negative	Sputum smears and cultures may be positive
Should consider treatment for LTBI to prevent TB disease	Needs treatment for TB disease
Does not require respiratory isolation	May require respiratory isolation

Note: Both TB disease & LTBI are reportable in Indiana.



Where Do I Fit In?

TB Core Services

- LHDs should provide or ensure case management for those with suspected or confirmed TB disease, including investigation and specimen collection, enforcing isolation, providing directly observed therapy, and coordinating clinical and social needs
- LHDs should conduct investigations for those diagnosed with infectious TB disease, including contact identification, education, testing, and treatment (as needed)
- LHDs should coordinate clinical follow-up for those designated with a Class B immigration status and provide or ensure case management and directly observed therapy for TB if needed
- LHDs should work with IDOH to identify and treat latent TB infection (LTBI) according to the IDOH TB Elimination Plan
- LHDs should be aware of the socioeconomic, environmental, and behavioral factors that place individuals in their communities at risk, such as housing/crowding, sexual behaviors, and underrepresented/underserved individuals

What is a TB Case Manager?

- Liaison who links together:
 - Patient
 - Providers
 - Social service agencies
 - Health care facilities
 - Laboratory
 - Local health departments:
 - Health officer
 - Directly-observed therapy outreach worker
 - State health departments:
 - TB regional nurse consultant
 - Surveillance staff

Duties of a TB Case Manager

- Confirm the presence or absence of TB disease
- Interview the patient
- Determine if the patient may be infectious
- Verify that appropriate isolation measures have been implemented
- Determine the infectious period and possible sites of exposure

Duties of a TB Case Manager continued

- Assist in obtaining medication through Purdue Pharmacy
 - Medication for TB Disease (& LTBI) is available for free (as IDOH covers the cost) when LHDs order through Purdue Pharmacy
- Ensure that regimen, dosage, and length of treatment are per standard of care

Duties of a TB Case Manager continued

- For TB disease, ensure patient receives medication using directly observed therapy (DOT)
 - Electronic DOT may be an option
 - Follow your LHD policies
 - Consider case circumstances
 - Ensure DOT logs are accurate and up-to-date

Duties of a TB Case Manager continued

- Ensure that each patient/family is educated about TB and its treatment
- Keep a case management record on each patient
- Ensure patients are reported to IDOH through NBS
- Assist with social needs:
 - Link to care (primary care provider, specialty providers)
 - Housing
 - Groceries
 - Health insurance/Medicaid

Duties of a TB Case Manager continued

- Ensure that the patient is educated about and offered an HIV test
- Monitor the patient's clinical progress:
 - Signs and symptoms
 - Lab specimen results
 - Adverse reactions to medications
- Ensure that monthly reports are sent to IDOH in a timely manner
- Document when the patient converts sputum cultures to negative

Duties of a TB Case Manager continued

If patient was infectious, conduct a contact investigation for all exposed contacts:

- Provide/organize testing of contacts with TSTs or IGRAs
- Ensure medical evaluations are completed for positive reactors
- Order/administer/document LTBI treatment
- Report all contacts and outcomes to IDOH in NBS

TB Resources

- IDOH Laboratory:
 - AFB smears, PCR, cultures, drug sensitivities, pyrosequencing, genotyping
 - Testing of hospital-collected samples by request
- TB medications through Purdue Pharmacy:
 - TB disease
 - LTBI
- Enablers/Incentives through IDOH:
 - Transportation, food, hotel, etc.
- TB medical consult:
 - Cohort review
 - By request of case manager/physician

TB Resources IDOH Staff

TB Program Staff

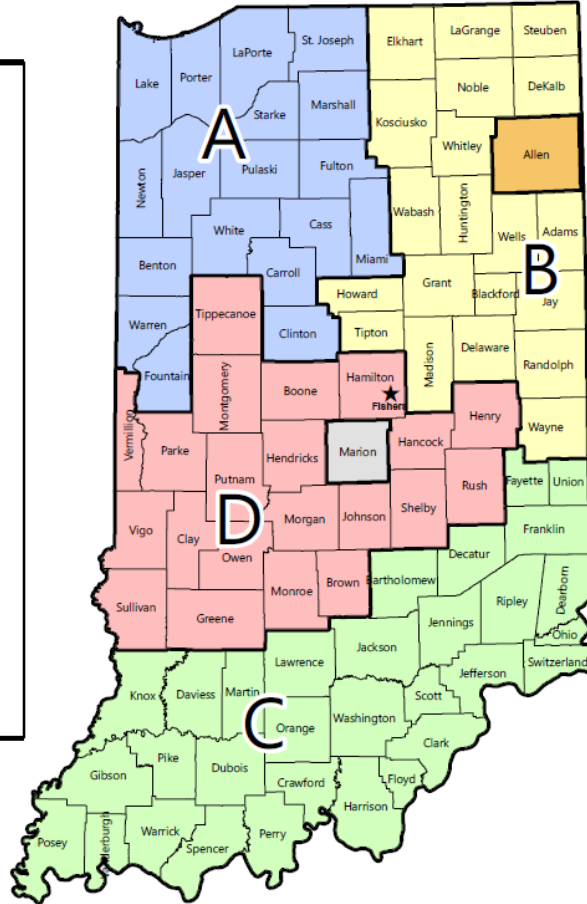
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TB Resources

- CDC TB website (www.CDC.gov/TB):
 - TB educational materials, including translated patient resources
 - TB guidelines
 - Infection control
 - TB data
- IDOH TB Prevention and Care website (www.TB.in.gov):
 - LHD resource section
 - Infection Preventionist resources
 - Healthcare provider section
 - Basic TB/LTBI information
 - Quick guides/webinar on using NBS surveillance system
 - Indiana data
 - Access to translated patient materials

Refugee Health Program

- Coordinates the refugee health medical screening program through contracting with clinics (local health department, FQHCs, and private clinics) to conduct domestic health assessments for all refugees and ensures these assessments are done in a timely and complete manner
- Monitors funds designated for Refugee Health Promotion and provides support to local agencies to enhance refugee self-sufficiency and acculturation
- Collects data to identify emerging trends in refugee health and provides partners with evidence-based information on health needs and program gaps
- Collaborates with local, state, and federal partners to ensure providers and other stakeholders are aware of refugees and can address their health needs in a culturally competent manner

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