



Indiana State Department of Health

Tuberculosis Medical Advisory Board Guidelines for HIV Testing of Tuberculosis Cases, Suspects and Contacts

Opt-out HIV testing (assent is inferred unless the patient declines testing) should be a part of routine clinical care in all health care settings and recognized as a standard of care for all suspects and diagnosed cases of Tuberculosis aged 13 years and above.

Background

These recommendations were formulated in response to data suggesting that the current strategy of testing on the basis of risk has failed to identify a substantial segment of HIV-infected Americans.

- At the end of 2003, of the approximately 1.0-1.2 million persons estimated to be living with HIV in the United States, an estimated one quarter (252,000-312,000 persons) were unaware of their infection and therefore unable to benefit from clinical care to reduce morbidity and mortalityⁱ.
- The HIV epidemic continues to evolve. After an initial decline in new infections, rates are again increasing. Of these new infections, 54% are estimated to be acquired from the 25% of infected people who are unaware of their serostatusⁱⁱ.
- Increased at risk are those aged <20 years, women, members of racial or ethnic minority populations, persons who reside outside metropolitan areas, and heterosexual men and women who frequently are unaware that they are at risk for HIVⁱⁱⁱ.

In addition, the co-infection of Tuberculosis (TB) and HIV can complicate the treatment and case management follow-up associated with public health.

- HIV co-infection is the single most critical risk factor in the progression of TB infection to active disease. HIV and TB interact in ways that tend to worsen both diseases among co-infected persons. An HIV-infected person diagnosed with LTBI has a 10% annual risk of progression to active disease, which is 113-170 times greater risk than someone who is not HIV-infected with no other risk factors^{iv}.
- HIV-infected patients with pulmonary TB disease tend to have atypical findings on CXR (less likely to have apical cavities and are more likely to have lower lobe or interstitial infiltrates and mediastinal or paratracheal lymphadenopathy) or might also present with a normal CXR. HIV-infected persons are also more likely to have extrapulmonary and miliary disease than persons without HIV infection^v.
- A major concern in treating TB in HIV positive persons with first line drugs, is the interaction of rifampin with antiretroviral agents. However, TB treatment without the use of rifampin have shown to have higher mortality and relapse rates among HIV positive persons^{vi}.
- Knowledge of HIV infection will highlight the need for Directly Observed Therapy (DOT), place heightened awareness side effects (drug interactions, toxicity, ect.) during monthly medical follow-up appointments, and ensure greater urgency in identifying and evaluating contacts.

Guidelines

The Indiana State Department of Health, TB Program supports the overall CDC goal of maximizing the number of persons who are aware of their HIV infection and receive care and preventive services early. ***For this reason, opt-out HIV testing should be a part of routine clinical care in all health care settings and recognized as a standard of care for all suspects and diagnosed cases of TB aged 13 years and above. TB contacts and persons receiving treatment for Latent TB Infection (LTBI) should be educated about the risks of co-infection with HIV and offered HIV testing. Conversely, persons who are HIV positive should be routinely screened for TB.*** Any HIV testing performed should be done in accordance with both [Indiana Code IC 16-41-6](#) and the individual agency's guidelines or recommendations.

In performing HIV testing among TB patients, providers should ensure that:

- Testing for HIV infection should be voluntary and done only with patient's knowledge.
- Patients or persons responsible for the patient's care should be notified orally that testing is planned, advised of the indication for testing and the implications of positive and negative test results, and offered an opportunity to ask questions and to decline testing. With such notification, the patient's general consent for medical care is considered sufficient for diagnostic HIV testing.
- Easily understood informational materials should be made available in the languages of the commonly encountered populations within the service area. The competence of interpreters and bilingual staff to provide language assistance to patients with limited English proficiency must be ensured.
- Access to clinical care, prevention counseling, and support services are available for persons that test positive.

High suspicion of HIV infection should be maintained for:

- All patients with signs or symptoms consistent with HIV infection or an opportunistic illness characteristic of AIDS.
- All patients who have a compatible clinical syndrome and who report recent high-risk behavior. When acute retroviral syndrome is a possibility, a plasma RNA test should be used in conjunction with an HIV antibody test to diagnose acute HIV infection.^{vii}
- All persons likely to be at high-risk include injection-drug users and their sex partners, persons who exchange sex for money or drugs, sex partners of HIV-infected persons, and men who have sex with men or heterosexual persons who themselves or whose sex partners have had more than one sex partner since their most recent HIV test. In these high-risk groups, HIV testing should be performed at least annually. Repeat testing of persons not likely to be at high-risk for HIV should be performed on the basis of clinical judgment.
- Health-care providers should encourage patients and their prospective sex partners to be tested before initiating a new sexual relationship.

These guidelines are intended to be flexible and should be adapted to individual circumstances. An individual treatment plan must be developed for each patient and will depend on the medical

condition of the patient, the clinical judgement of the physician, and the availability of resources for laboratory testing, hospitalization, and expert consultation.

References

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^{iv} CDC. Controlling Tuberculosis in the United States: Recommendations from the American Thoracic Society, CDC and the Infectious Disease Society of America. MMWR 2005;54;RR-12.

^v CDC. Controlling Tuberculosis in the United States: Recommendations from the American Thoracic Society, CDC and the Infectious Disease Society of America. MMWR 2005;54;RR-12.

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