


Epidemiology of Tuberculosis Cases in Chicago

March 19, 2019
 2019 Chicago Tuberculosis Conference
In commemoration of World TB Day

Theodore Bonau, MPH
 Epidemiologist III, Tuberculosis Program
 Chicago Department of Public Health

The planners, editors, faculty and reviewers of this activity have no relevant financial relationships to disclose. This presentation was created without any commercial support.



2019 Chicago Tuberculosis Conference

March 19, 2019
 Theodore Bonau

The planners, editors, faculty and reviewers of this activity have no relevant financial relationships to disclose. This presentation was created without any commercial support.

To obtain credit you must:

- Complete an electronic evaluation
- After completing the evaluation you can generate your certificate immediately.

In support of improving patient care, Rush University Medical Center is accredited by the American Nurses Credentialing Center (ANCC), the Accreditation Council for Pharmacy Education (ACPE), and the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing education for the healthcare team.

Rush University Medical Center designates this live activity for a maximum of 3.5 AMA PRA Category 1 Credit(s)[™]. Physicians should claim only credit commensurate with the extent of their participation in the activity.

ANCC Credit Designation – Nurses
 The maximum number of hours awarded for this CE activity is 3.5 contact hours.

This activity is being presented without bias and without commercial support.

Rush University is an approved provider for physical therapy (216.000272), occupational therapy, respiratory therapy, social work (159.001203), nutrition, speech-audiology, and psychology by the Illinois Department of Professional Regulation.

Rush University designates this live activity for 3.5 Continuing Education credit(s).

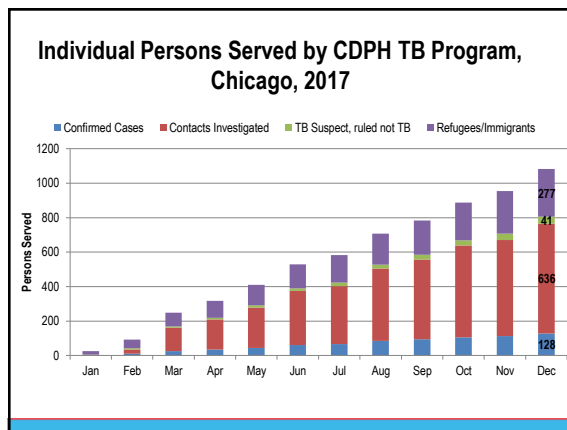
Learning Objectives

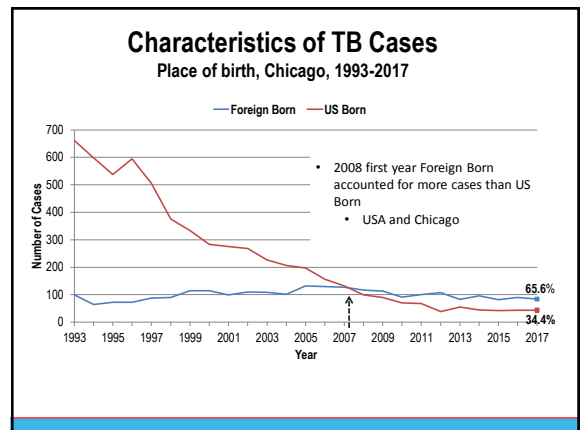
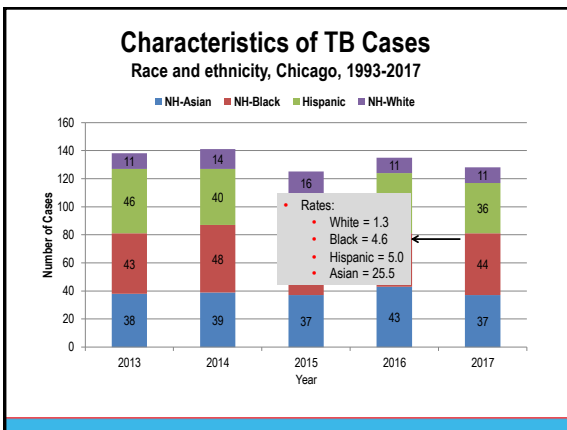
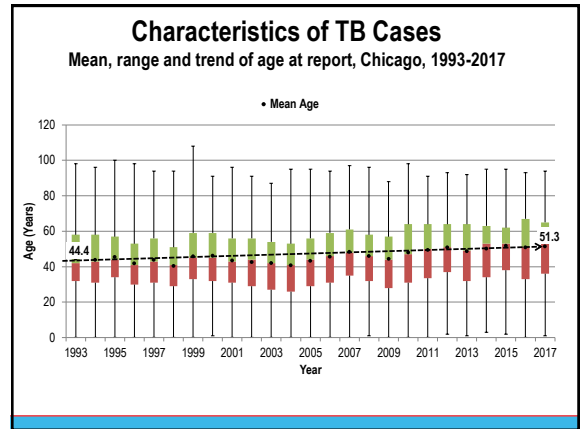
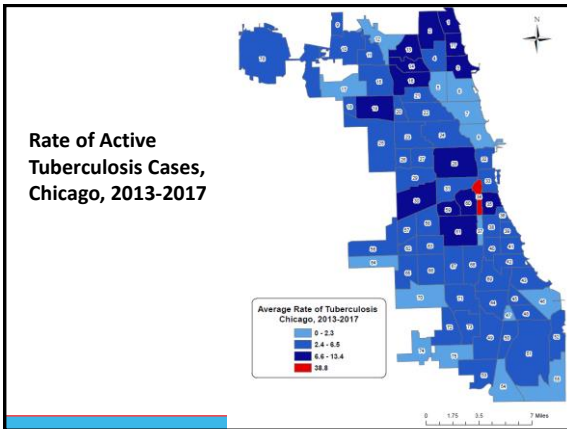
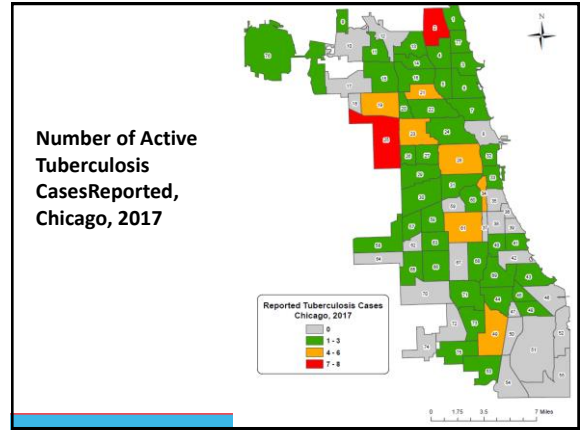
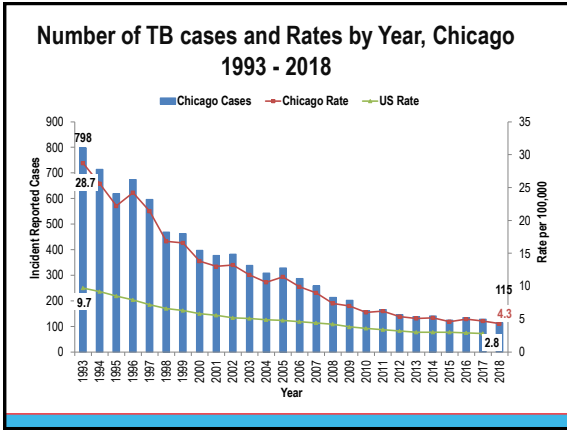
At the conclusion of this course participants will be able to:

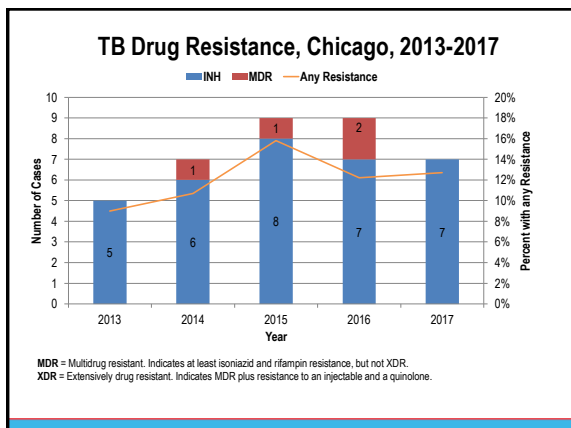
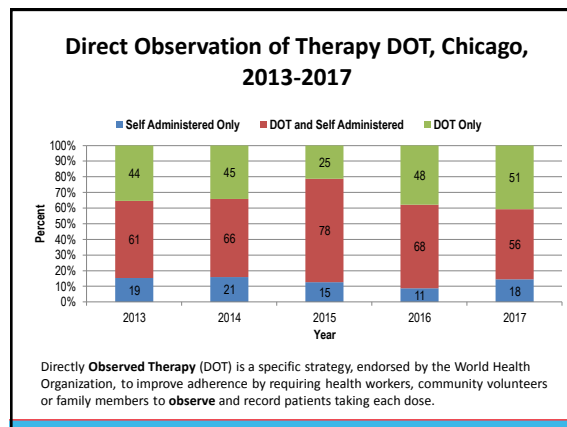
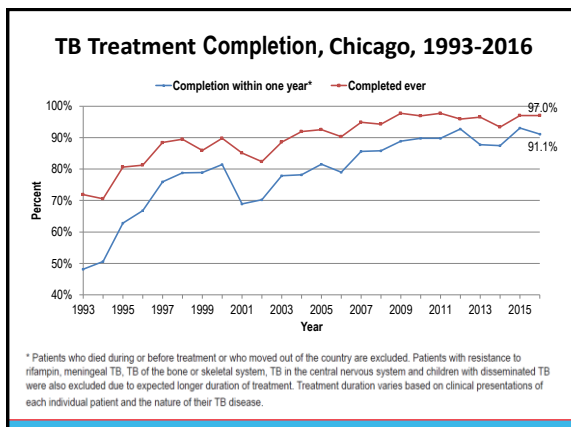
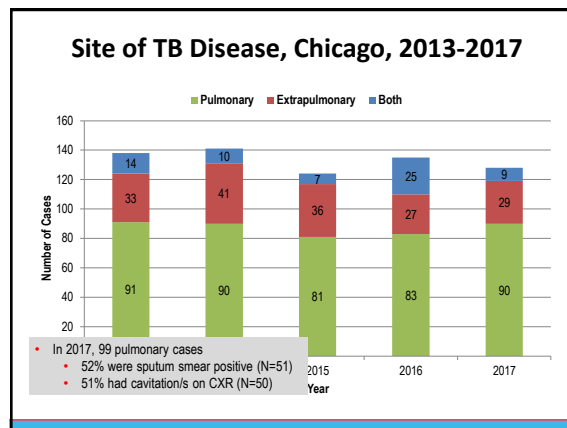
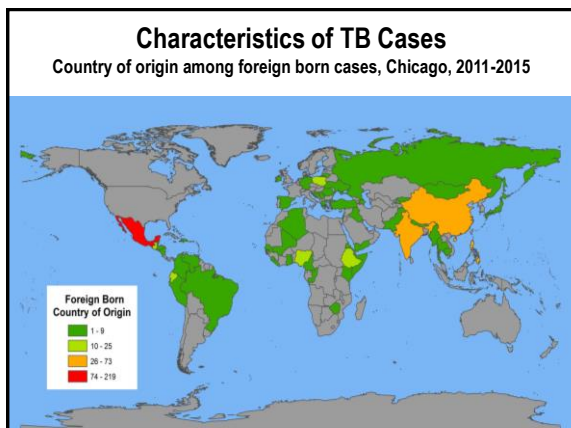
- Discuss the prognosis and mortality rate of untreated pulmonary TB
- Recall local, state, and national TB data trends; Define whole genome sequencing (WGS) and how it is used in TB epidemiologic and contact investigations.
- Describe steps needed for a mass TB screening; identify appropriate TB test for individual patients.
- Identify strategies to reduce or stop alcohol consumption among patients with TB
- Identify components of nurse care management, as it pertains to tuberculosis and discuss various approaches to challenging situations

Chicago Department of Public Health TB Program

- Serve City of Chicago, ~2.7 million people
- 17 FTE
 - Medical Director
 - Program Director
 - Epidemiologist
 - Case Management
 - 5 Public Health Nurses (PHN)
 - Field Services
 - 7 Disease Investigators
 - 2 Public Health Aides (DOT)



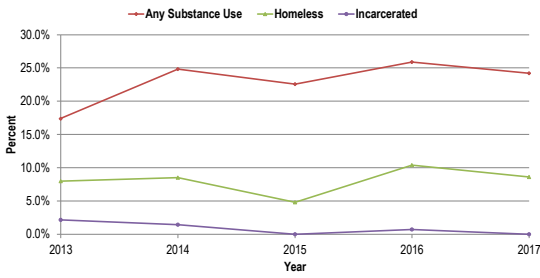




Co-Morbidities of TB Cases, Chicago, 2013-2017

| Year | HIV Co-infection (% of tested) | | Diabetes | |
|--------------|--------------------------------|-------------|------------|--------------|
| | No. | % | No. | % |
| 2013 | 10 | 9.1% | 17 | 12.3% |
| 2014 | 8 | 6.7% | 26 | 18.4% |
| 2015 | 7 | 7.0% | 34 | 27.4% |
| 2016 | 6 | 5.1% | 27 | 20.0% |
| 2017 | 7 | 6.9% | 25 | 19.5% |
| Total | 38 | 6.9% | 129 | 19.4% |

Behavioral Characteristics of TB Cases, Chicago, 2013-2017



Key Points

- Cases of active TB dramatically decreased from the early 1990's to 2017
- Reported active TB cases have plateaued since 2012
- Foreign-born persons continue to account for the majority of cases with rates highest among those identifying as Asian
- HIV co-infection has remained relatively stable
- Drug resistance affects about 12% of Chicago active TB cases annually with low numbers of MDR-TB



 @ChiPublicHealth
  /ChicagoPublicHealth
 HealthyChicago@CityofChicago.org
  www.CityofChicago.org/Health