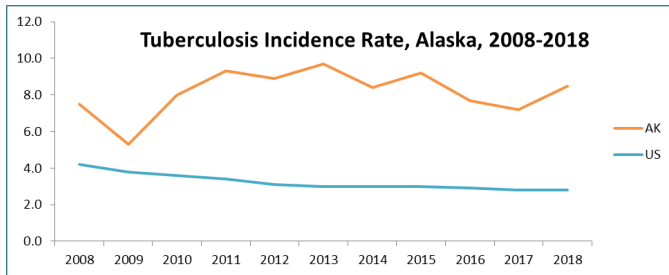




Reported TB Cases

In 2018, 63 people with TB disease were reported in Alaska. The 2018 TB incidence rate was 8.5 cases per 100,000 population, an increase from the previous two years. The national TB incidence was 2.8 cases per 100,000 in 2018.



Historically, Alaska had some of the highest rates of TB morbidity and mortality ever recorded in the early and mid-20th century. Much of the TB activity in Alaska today is related to this legacy and the ongoing challenges of health care infrastructure and geography. Activation of longstanding, untreated latent infection contributes to Alaska’s high incidence rate.

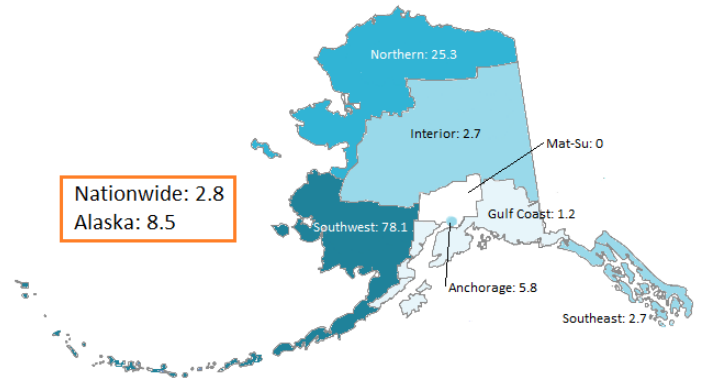
In 2018, Alaska had the highest TB incidence rate in the nation.

Jurisdiction	Number Cases	Incidence of TB
Alaska	63	8.5
Hawaii	120	8.4
California	2,091	5.3
Texas	1,129	3.9
New York	750	3.8

Trends and populations

The incidence of tuberculosis is not evenly distributed in Alaska; it varies dramatically in different locations and populations. The median age of reported cases was 29 years (range 1-83 years), younger than typically seen in Alaska or nationwide. In Alaska 14 cases (22%) were foreign-born; in comparison, nationally two thirds of cases were foreign-born.

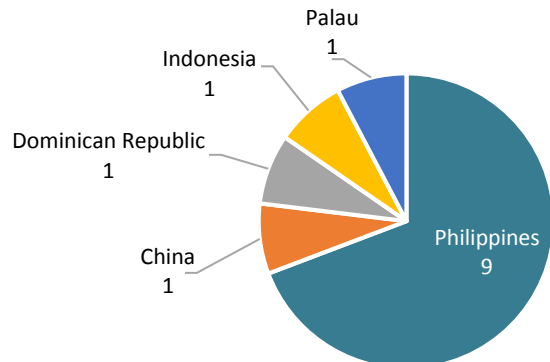
Regional Incidence per 100,000 population



Case demographics and social risk factors

		2018 Count (%)	2018 Incidence
Sex	Male	46 (73%)	12.1
	Female	17 (27%)	4.8
Pediatric (0-14 years)		14 (22%)	8.9
Foreign-born		14 (22%)	24.
Race	Am. Indian/ AK Native	46 (73%)	40.7
	Asian	11 (17%)	23.1
	White	3 (5%)	0.4
	Pacific Islander	2 (3%)	19.8
	Other	1 (2%)	
	Black	0 (0%)	0.0
Homeless		2 (3%)	105
Drug Use (IV & non-IV)		10 (16%)	
Excessive alcohol use		11 (17%)	
Known epi-link to another active case		33 (52%)	

Foreign-born cases: count by birth-country





TUBERCULOSIS IN ALASKA- SUMMARY BRIEF 2018

Outbreaks, clusters, and investigations

In 2018, 33 cases (52%) had a known epidemiologic link to another active case, demonstrating the significance of recent transmission and the connectedness of rural communities with high TB burdens. Estimates of recent transmission in Alaska are higher than any other jurisdiction².

Clinical Features

Clinical feature	Count (%)
Sputa AFB smear positive	18 (35% of pulmonary cases, 29% of all cases)
Sputa culture positive	39 (76% of pulmonary cases, 62% of all cases)
Isoniazid resistant	5 (8%)
Multi-drug resistant	0 (0%)
Previous TB disease	6 (10%)
Abnormal chest x-ray or CT	37 (59%)
Died before diagnosis	1 (2%)

Site of disease

Site	Count (%)
Pulmonary	51 (81%)
Lymphatic	3 (5%)
Ocular	3 (5%)
Peritoneal	3 (5%)
Pleural	2 (3%)
Bone	1 (2%)
Gallbladder	1 (2%)
Meningeal	1 (2%)
Small intestine	1 (2%)

Program Challenges

- LTBI treatment initiation was lower than national targets among both identified contacts (77%) and immigrants and refugees (42%) diagnosed with LTBI (targets: 91% and 93% respectively).
- Geographic and climatic barriers continue to challenge timely evaluation, laboratory testing, directly observed treatment, and contact investigation.

Program Successes

- Contact elicitation: 100% of infectious cases had contact investigations in 2018
- Contact evaluation: 89% of identified contacts to infectious cases were appropriately evaluated

- Treatment completion: In 2017 (most recent complete data), 91% of cases for whom treatment for 12 months or less was indicated completed treatment within twelve months
- Recommended initial therapy: 98% of patients with confirmed or suspected disease were started on an initial 4-drug regimen
- Drug susceptibility results: 100% of 2018 cases with a positive culture had drug susceptibility testing

In 2018 the TB control team, with a staff of ten, partnered actively with colleagues in the Alaska Section of Public Health Nursing; the Alaska State Public Health Laboratories; the Anchorage Health Department; and Alaska's medical and social services providers and institutions, pharmacists, and DOT and community health aides in the management and prevention of TB disease. Some of the work of the TB control program and partners in 2018 included:

- Evaluation of 238 additional suspect cases
- Evaluation of 338 identified contacts to infectious cases
- Treatment of 371 people with latent TB infection
- Completion of 7 community assessments in which over 2,000 people were evaluated for TB disease and latent TB infection
- Coordination of screening and follow-up for 70 immigrant/ refugee B-notifications

RESOURCES AND LINKS:

State of Alaska

TB Control Program Website: <http://dhss.alaska.gov/dph/Epi/id/Pages/tb.aspx>
 Section of Epidemiology TB Bulletins:
<http://epibulletins.dhss.alaska.gov/Bulletin/DisplayClassificationBulletins/39>
 Alaska TB Control Manual:
http://dhss.alaska.gov/dph/Epi/id/SiteAssets/Pages/TB_TB_Manual.pdf

Centers for Disease Control and Prevention

Main TB Website: <https://www.cdc.gov/tb/>
 National TB Indicators Project:
<http://www.cdc.gov/tb/publications/factsheets/statistics/ntip.htm>
 TB Glossary: <https://www.cdc.gov/tb/topic/basics/glossary.htm>
 State and City TB Report: <https://www.cdc.gov/tb/statistics/transmission.htm>
 1. Talwar A, Tsang CA, Price SF, et al. Tuberculosis — United States, 2018. MMWR Morb Mortal Wkly Rep 2019;68:257–262. DOI: <http://dx.doi.org/10.15585/mmwr.mm6811a2>
 2. Estimates of recent transmission: <https://www.cdc.gov/tb/statistics/reports/2017/ERT.html>