Hepatitis B Surveillance in New York City

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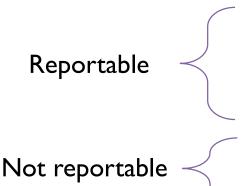
BACKGROUND



HBV Surveillance in NYC

MAVEN

- Receives and stores all electronic laboratory reports
- Performs deduplication of imported reports



- Positive core antibody IgM, surface antigen, "e" antigen, <u>DNA</u> (positive and negative), genotype
- Negatives, non-reportables and <u>ALTs</u> reported if on same accession as a reportable lab
- Core antibody total, surface antibody, "e" antibody



Demographic Data from Laboratory Reports

Demographic information received

Name

Date of birth

Social security number

Sex

Age

Address

• Phone number

Do not receive

- Race/ethnicity
- Country of birth
- Risk factors



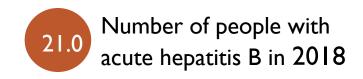
HBV in New York City

- Approximately I24,000 New York City (NYC) residents are diagnosed with chronic hepatitis B virus (HBV) infection¹
 - Previous estimate for diagnosed 100,000²
- There were 21 acute cases reported in 2018
- There were **6,075** individuals with chronic HBV reported to the New York City Department of Health and Mental Hygiene (NYCDOHMH) in 2018³

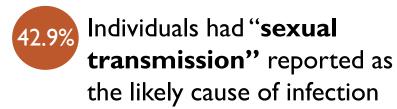


Acute Hepatitis B

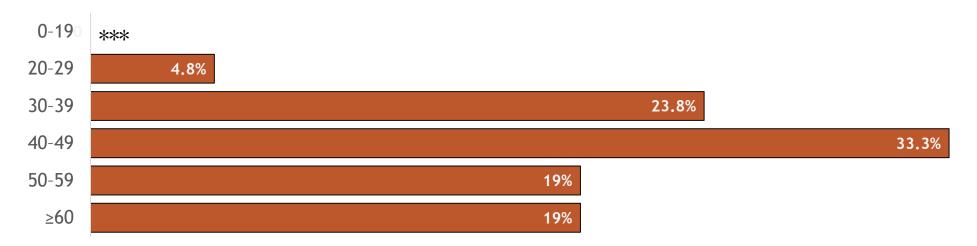








Age of people reported with acute hepatitis B in New York City, 2018



***In 2018, no children younger than 20 years of age were reported with **acute hepatitis B** infection because of **effective vaccination** and **perinatal prevention policies and programs**.

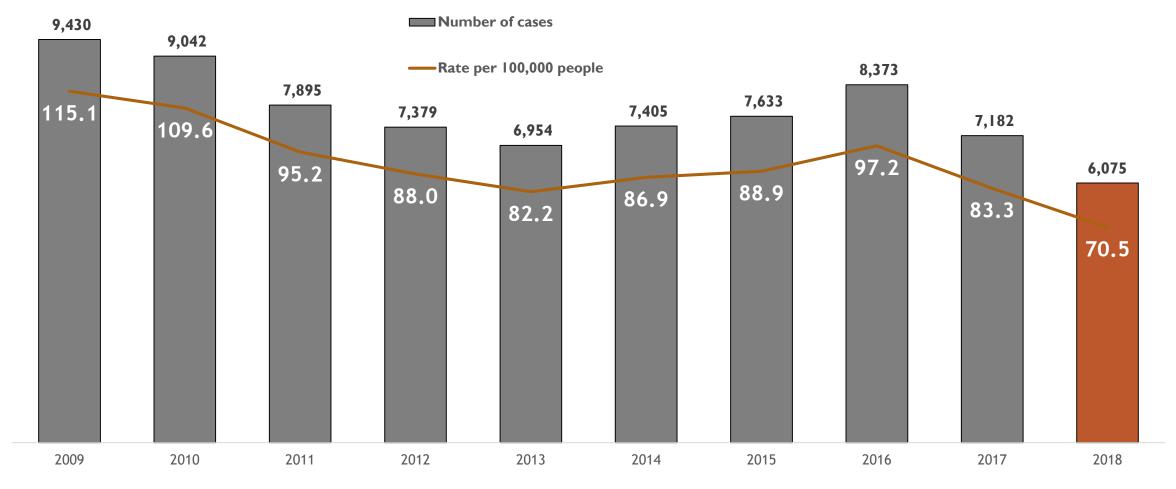


Chronic Hepatitis B



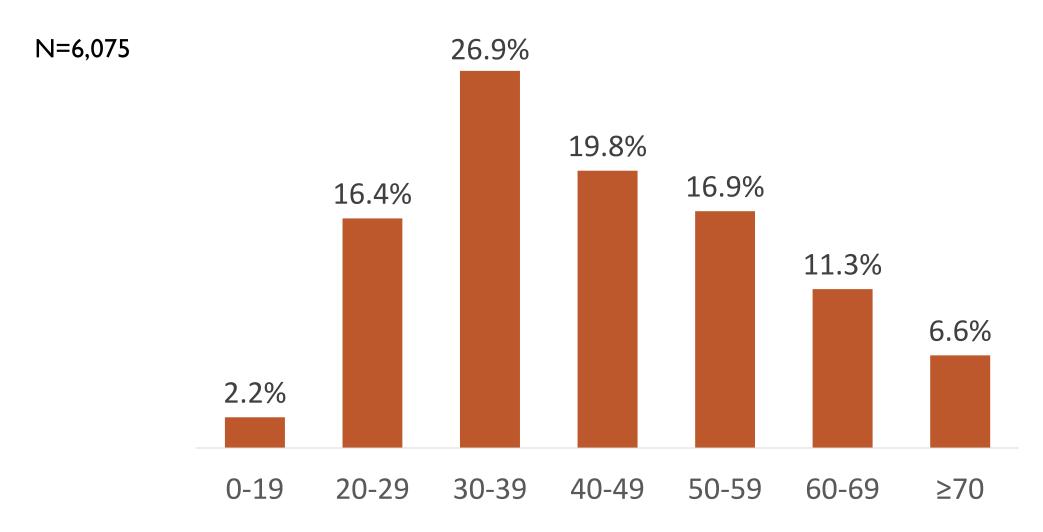
First-time reports for individuals with chronic hepatitis B declined from 2009 to 2018.

Although there was a 15.4% decrease in 2018, there have been more than 6,000 people with chronic HBV reported each year since 2009.



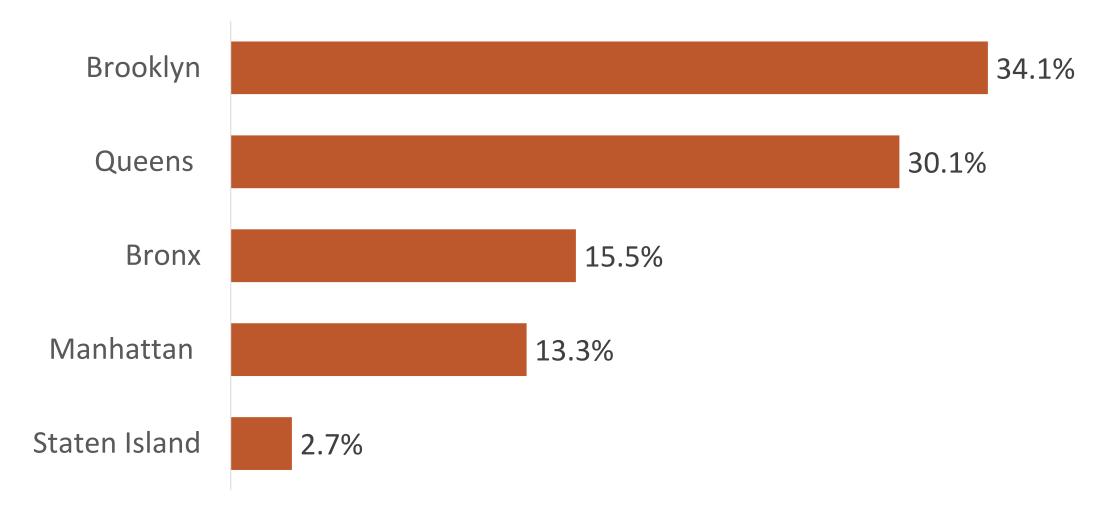


Characteristics of people first reported with chronic hepatitis B, NYC 2018 (Age)



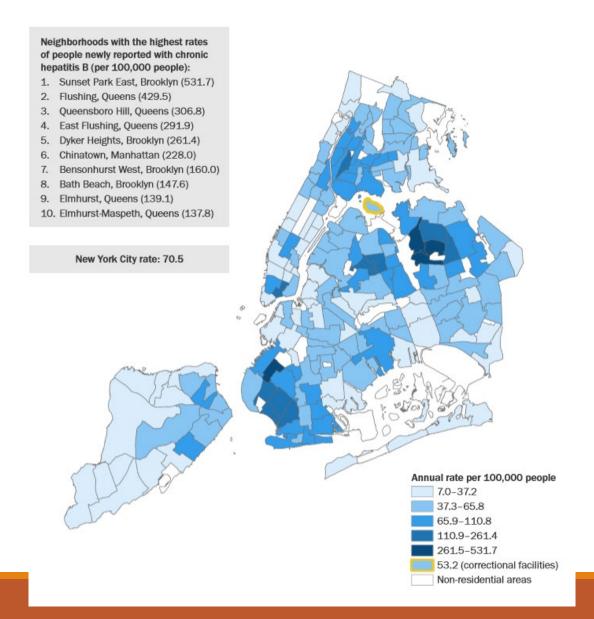


Characteristics of people first reported with chronic hepatitis B, NYC 2018 (Borough of Residence)





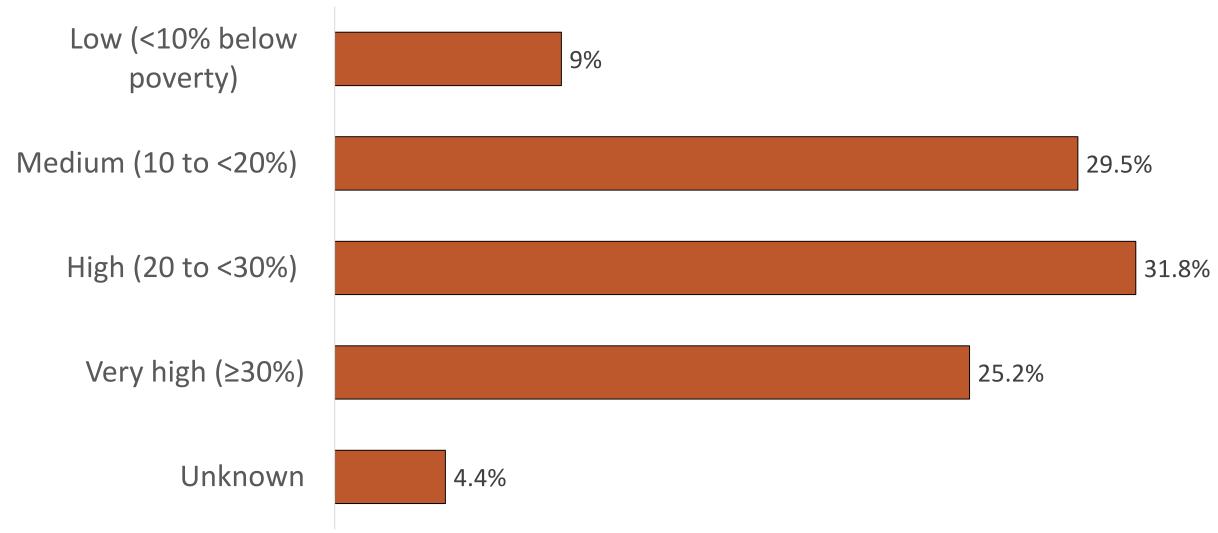
Rates of Chronic Hepatitis B** by Neighborhood, NYC 2018



**For individuals reported to DOHMH for the first time



Characteristics of people first reported with chronic hepatitis B, NYC 2018 (Neighborhood Poverty)





Prevalence Estimate



Prevalence definition (HBV infection):

(Number of people infected with Hepatitis B) (Total population of NYC)

Prevalence estimate (as of 2016):

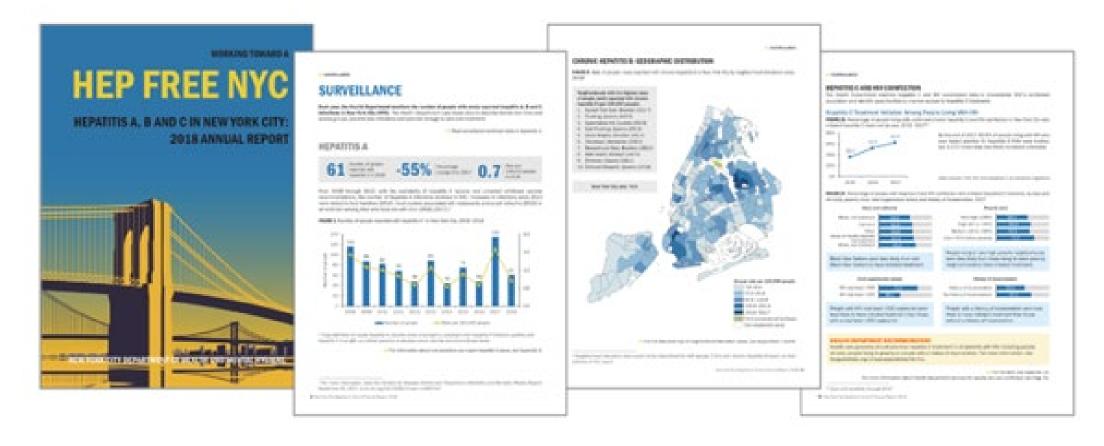
People with hepatitis B that have been diagnosed	People with hepatitis B we believe are undiagnosed	Number of people infected with Hepatitis B	NYC population, 2016	New York City Prevalence estimate 2016
124,000	106,000	230,000	8,615,000	2.7% of NYC residents



Resources

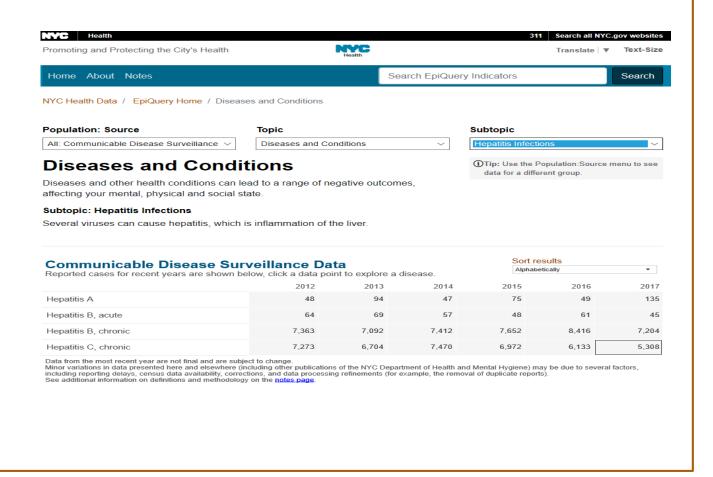


Hepatitis A, B and C in New York City: 2018 Annual Report





NYC Health Data: EpiQuery



nyc.gov/health/epiquery

Metrics:

- 1. Number of Reports
 - 2. Crude Rates
 - 3. Adjusted Rates

By neighborhood

Trend Over Time

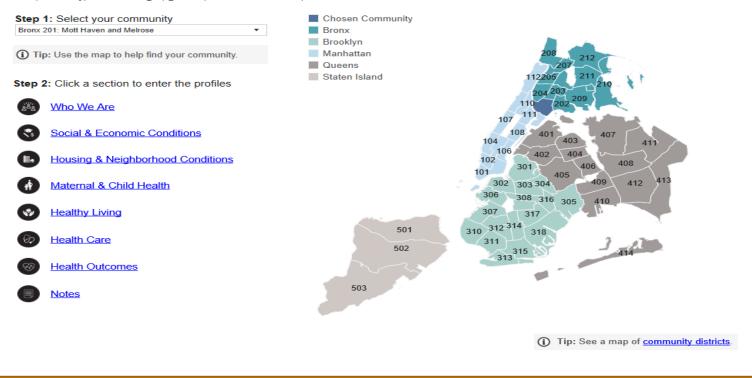


NYC Health Data: Community Health Profiles

About

The New York City Community Health Profiles capture the health of 59 community districts across the city. The Profiles contain over 50 measures of neighborhood health, emphasizing that our health starts where we live, work and play. These reports highlight the disparities among neighborhoods and can be used by policymakers, community groups, health professionals, researchers and residents to encourage community engagement and action.

Our neighborhoods are segregated by race and wealth. Differences in neighborhood resources have led to unfair health outcomes, with some New Yorkers living longer, healthier lives than others. These data should be interpreted with an understanding that good health is not only determined by personal choices. Many other factors shape differences in health outcomes, including past and current discrimination based on race, ethnicity, national origin, gender, sexual orientation, and other identities.



nyc.gov/health/healthprofiles



Questions?

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Hepatitis B Prevalence Among Immigrants

215,000

people with hepatitis B believed to be born outside the US

6.7% of non-US born New Yorkers



Chronic Hepatitis B Prevalence, NYC 2016

230,000

People living with hepatitis B in NYC as of 2016

(95% confidence limits: 186,474 – 304,191)

2.7% of NYC residents

Includes people with diagnosed and undiagnosed infection



Diagnosed and Undiagnosed Hepatitis B

124,000 people with <u>diagnosed</u> hepatitis B in NYC1.5% of New York City residents

106,000 people with <u>undiagnosed</u> hepatitis B:46% of all New Yorkers with hepatitis B

