

Healthy Chicago Data Brief

HPV Updates



Chicago teens have never been better protected against human papillomavirus (HPV) and the cancers it causes. Results from the [National Immunization Survey-Teen \(NIS-Teen\)](#) indicate that in 2017, 82% of Chicago teens aged 13-17 had received at least one HPV vaccine and 67% of Chicago teens had completed the HPV vaccine series (2 or 3 doses depending on age at initiation).

As seen in Figure 1, in 2017, national HPV vaccination coverage hit an all-time high of 66% for series initiation and 49% for series completion, a statistically significant increase compared to 2016. While a non-significant increase was seen in Chicago, HPV vaccination coverage for both series initiation and completion is overall 16 percentage points higher than national coverage. Nationally, male HPV vaccination coverage falls behind those of their female counterparts. In Chicago this trend persists; HPV series completion is overall 13 percentage points higher in females.

Figure 1. HPV Vaccination Coverage Among Adolescents Aged 13-17 Years by Region and Sex, 2017

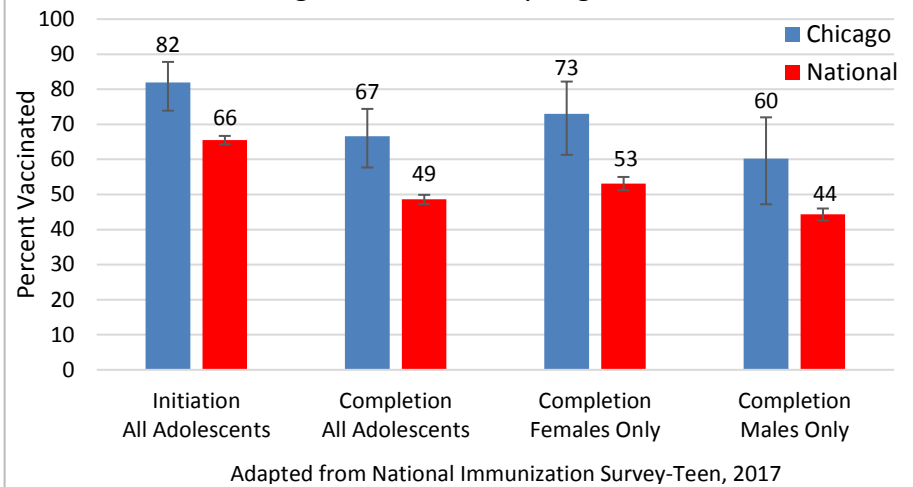
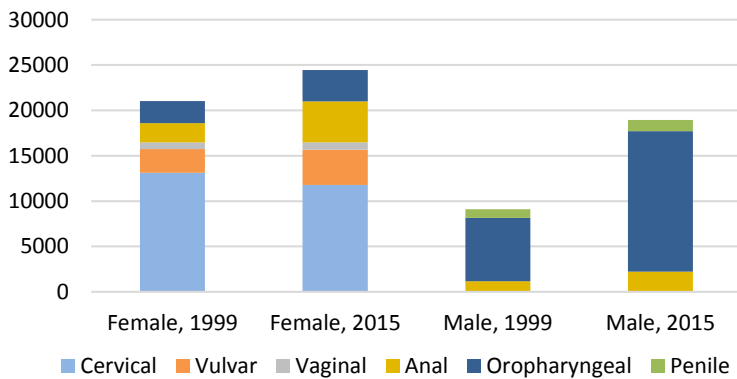


Figure 2. Distribution of U.S. HPV Associated Cancer Cases by Type and Sex, 1999-2015



Adapted from Van Dyne et al. Trends in Human Papillomavirus-Associated Cancers — United States, 1999–2015. MMWR. 2018;67:918–924.

HPV vaccination efforts are our best protection against rising HPV-associated cancer rates. A CDC analysis of [National Program of Cancer Registries and National Cancer Institute](#) data shows that from 1999-2015, the number of new HPV-associated cancers diagnosed annually have increased from 30,115 to 43,371.

As seen in Figure 2, from 1999-2015, oropharyngeal cancer rates increased at an average of 2.7% per year in men and 0.8% per year in women. In 2015, oropharyngeal cancer incidence surpassed cervical cancer incidence, becoming the most common HPV-associated cancer. This rapid increase underscores the need for optimizing HPV vaccination coverage among both males and females.

Improving Health Equity

The Chicago Department of Public Health is committed to achieving health equity, ensuring every resident has the opportunity and resources they need to get and stay healthy.

Economic hardship has been found to be correlated with higher cervical cancer incidence and mortality in Chicago. To address the inequitable cancer burden many pocket-of-need communities in Chicago are facing, CDPH is targeting HPV education and outreach to medical providers in these areas. Additionally, CDPH is focusing on medical providers with low HPV vaccine utilization and high adolescent patient volume. Through targeted HPV vaccine efforts, CDPH strives to reduce cancer incidence in the communities that need it most, ultimately improving health equity.

How do you increase HPV vaccination rates?

HPV vaccination is not required for school entry in Illinois, so it is not surprising that HPV vaccination rates lag behind rates of other required vaccines. When surveyed, parents of adolescents cited lack of a provider recommendation as one of the top reasons they did not vaccinate their child against HPV. Lack of knowledge and safety concerns about the vaccine are also common reasons for vaccine refusal. These findings indicate that a strong recommendation from a knowledgeable provider is critical to the uptake of the HPV vaccine.

Providers can increase HPV vaccination rates by adopting the “same way, same day” technique. Studies have found that when providers recommend the HPV vaccine as confidently as they recommend the required preteen vaccines against tetanus, diphtheria, pertussis, and meningitis, HPV vaccine uptake increases. Provider education is a key component in the fight against HPV-associated cancer.

What is CDPH doing to increase HPV vaccination rates?

With the assistance of the Illinois Chapter of the American Academy of Pediatrics, CDPH has engaged 100 local medical practices in a quality improvement project focused on HPV vaccination rates. CDPH staff and peer-clinician coaches are conducting in-person visits to participating clinics, where they educate providers about the HPV vaccine and assist in the development of practice-wide quality improvement strategies. Special attention is given to medical assistants, who can participate in CDPH’s two-part webinar series for medical assistants on promoting the HPV vaccine.

CDPH promotes collaboration through its work with community partners like EverThrive Illinois, American Cancer Society, and Chicago Public Schools. This year, for the first time, information about the HPV vaccine was included in Chicago Public Schools’ back-to-school health packets. Additionally, CDPH is working with HPV advocates to host a roundtable event in November 2018 where allied health professionals, community partners and students will come together to discuss approaches for promoting the HPV vaccine and reducing cancer.

Additional Resources:

- **The Centers for Disease Control and Prevention:** The CDC provides resources for health care professionals and the public about HPV vaccine and its cancer prevention potential www.cdc.gov/hpv/
- **HPV Quality Improvement:** HPV IQ provides health care professionals with evidence based-tools for HPV vaccine quality improvement <https://www.hpviq.org/>
- **EverThrive Illinois:** EverThrive Illinois works to improve the health of women, children, and families over the lifespan through community engagement, partnerships, policy analysis, education and advocacy www.everthriveil.org



ChicagoHealthAtlas.org

The Chicago Health Atlas is a website developed by CDPH and the Smart Chicago Collaborative to allow users to easily explore, analyze and download health-related data for the city of Chicago. Users can view data on their desktop or mobile device for more than 160 data indicators to explore the demographics, health outcomes, behaviors and social characteristics of Chicago residents and their neighborhoods.