St. Jude Children's Research Hospital®

HPV Cancer Prevention Program

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Empowering American Indian and Alaska Native Communities

Bridging Gaps in HPV Vaccination and Cancer Prevention

November 6, 2024

stjude.org/hpv • #EndHPVCancers

Learning Objectives

- Discuss the importance of acknowledging the cultures and traditions of American Indian and Alaska Native communities.
- Review data showing inequities in HPV vaccination and HPV cancers within American Indian and Alaska Native communities.
- Discuss evidence-based interventions designed and tailored for American Indian and Alaska Native populations.
- Discuss the application of best practices to address disparities and improve HPV vaccination coverage among American Indian and Alaska Native adolescents and adults.

Janel H. Johnson, DO

MODERATOR

Assistant Clinical Professor of Medical Education, OSU-COM at the Cherokee Nation and Cherokee Nation

Presenters

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Ronny A. Bell, PhD
Fred Eshelman Professor and Chair of the Division of Pharmaceutical Outcomes and Policy at the Eshelman School of Pharmacy at the University of North Carolina at Chapel Hill (UNC) and Associate Director of Cancer Care Access and Excellence for the UNC Lineberger Comprehensive Cancer Center

Jessica Buck DiSilvestro, MD
Citizen of the Caddo Nation of Oklahoma, Gynecologic Oncologist, Tufts Medical Center

Melissa Buffalo
Meskwaki &CEO, American Indian Cancer Foundation Dakota

Kristine Sprigler
Cervical Cancer Survivor

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Moments of Community, Culture, and Connection

Land acknowledgements and words of cultural significance or meaning.

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Rapid Fire Talks

Understanding and applying strategies that work to improve HPV vaccination coverage in AIAN communities.

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Melissa Buffalo

PRESENTER

Meskwaki & Dakota
CEO, American Indian Cancer Foundation

Protecting Generations: HPV Vaccination for Indigenous Wellness

Melissa Buffalo, Meskwaki/Dakota
Chief Executive Officer

American Indian Cancer Foundation®

American Indian Cancer Foundation

Overview

- Introduction: HPV Vaccination for Indigenous Wellness
- Understanding The American Indian Cancer Foundation
- American Indian & Alaska Natives Communities and Tribal Diversity Overview of Tribal Nations
- Demographic and Geographic diversity of AI/AN populations
- Role and Purpose of Indian Health Service – Contributions – Limitations
- Past Harms, Mistrust, and Misclassification
- Barriers and Challenges to HPV Vaccination
- Promising Practices

American Indian Cancer Foundation

Protecting Generations:
HPV Vaccination for Indigenous Wellness

American Indian Cancer Foundation

American Indian Cancer Foundation

A national non-profit established to address the tremendous cancer inequities faced by American Indians and Alaska Natives.

Mission: To eliminate cancer burdens of American Indian families through education and improved access to prevention, early detection, treatment, and survivor support.

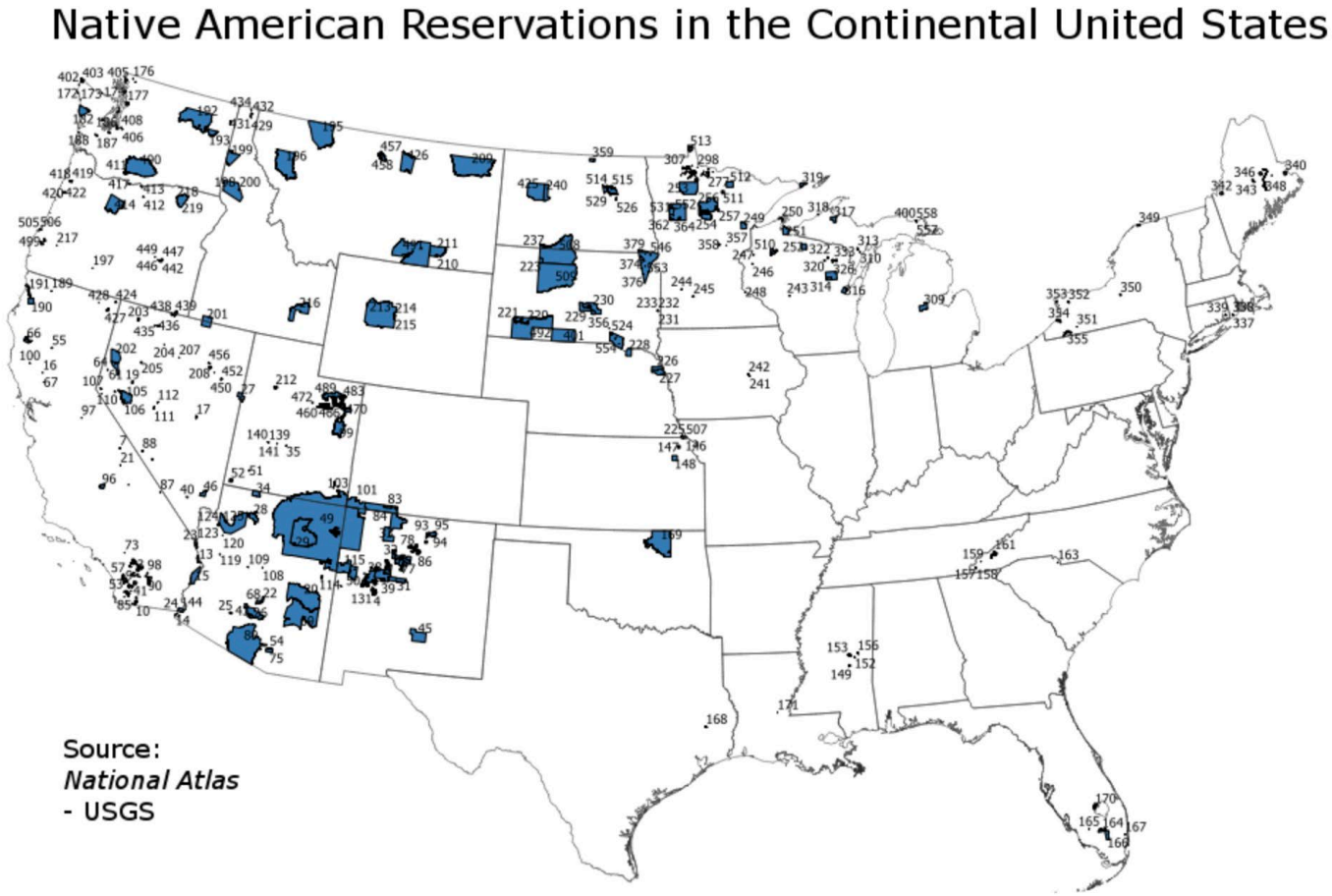
American Indian Cancer Foundation

Our Vision

Our vision is a world where cancer is no longer a leading cause of death for American Indians and Alaska Natives.

American Indian Cancer Foundation

Tribal Nations



American Indian Cancer Foundation

Demographic and Geographic Diversity

- Population Differences
- Urban vs. Rural
- Historical Relocation
- Historical Trauma
  - Loss of language and culture
  - Generational trauma

American Indian Cancer Foundation

Role of the Indian Health Service

- Primary Healthcare Provider
- Federal Trust Responsibility
- Public Health Initiatives
- Resource Challenges
- FY 2023: expenditure per user: $4,078, national average: $13,493
- FY 2023 Per federal inmate: $6,714

American Indian Cancer Foundation

Past Harms, Mistrust, and Misclassification

- Unethical medical practices
  - Forced Sterilization
- Unethical research practices
  - Havasupai Tribe
  - Barrow Alcohol Study
- Suppression of traditional practices

American Indian Cancer Foundation

Barriers and Challenges to HPV Vaccination

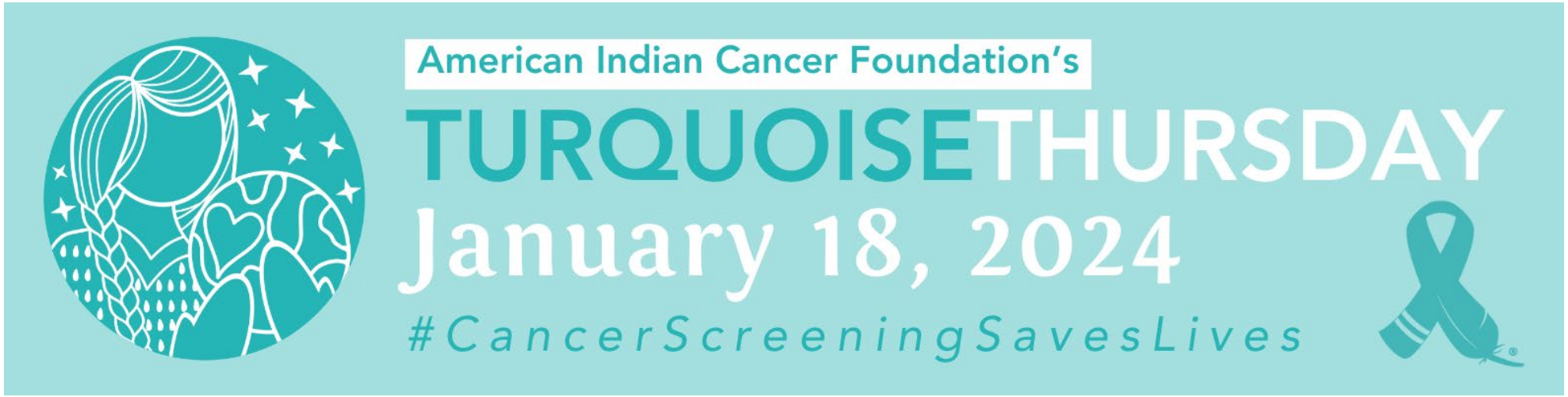
- An estimate 70% of AI/AN have at least one HPV immunization dose ages 13-17 years
- AI/AN women have significantly higher rates of cervical cancer compared to white women
- AI/AN women have lower rates of cervical cancer screening

American Cancer Society Facts & Figures Special Section: Cancer in the American Indian and Alaska Native Population, 2022

American Indian Cancer Foundation

Promising Practices

- HPV vaccine webinar
- Campaigns to raise awareness in Jan and Sept
- Culturally tailored toolkits



American Indian Cancer Foundation

Promising Practices

H2 new HPV immunization resources
HPV & cervical cancer webinar
Social media toolkit for tribal and urban clinics

HPV Cancer Prevention

A parent's guide to the HPV vaccine for your preteen

The American Indian Cancer Foundation asked parents what they need to know about the HPV vaccine. We listened, and want to give you the best information to help make the right choice for your child.

Why does my child need the HPV vaccine? Is it necessary?

Cancer is a leading cause of death for American Indians. By getting the HPV vaccine for your child, you can protect them from common HPV cancers, which include cervical, anal, penile, vaginal, and some throat cancers. American Indians are at higher risk for many of the HPV cancers. In some regions, American Indians are four times more likely to get cervical cancer, the most common HPV cancer.

What is the best age to get the vaccine?

The vaccine is designed to be most effective for children ages 11-12. A child can get the vaccine at age 9. It's possible to get the vaccine after age 12, but it is not as effective. Getting the vaccine now, when it is most effective, will protect your child from cancers later in life.

What is HPV, and what does it have to do with cancer?

HPV is a common infection that can lead to several types of cancers. HPV is passed from skin-to-skin, usually during sex. Almost all people will come into contact with HPV in their lives. It is important to get the vaccine before coming into contact with HPV, which can develop into cancer.

Is it for boys and girls?

Yes. Both males and females can get throat and anal cancers from HPV. Men can also get penile cancer. Women can also get cervical, vaginal, and vulvar cancers.

Is it safe?

Yes. There have been 57 million doses of the HPV vaccine given, with zero serious safety concerns.

Does it actually prevent cancer?

Yes. HPV causes 99.9% of cervical cancers and the majority of other HPV cancers. The vaccine prevents the types of HPV that cause 70% of these cancers.

How can I get the vaccine?

Talk to your doctor about the HPV vaccine, even if they don't bring it up. The vaccine is free for all American Indians through the Vaccines for Children program.

American Indian Cancer Foundation
www.aicaf.org

American Indian Cancer Foundation. minnesota cancer alliance

American Indian Cancer Foundation

SURVIVOR SOVEREIGNTY

Native people face high rates of sexual assault, sexual abuse, child abuse, and domestic violence. ***According to the National Institute of Justice, more than four in five Native men and women have experienced violence in their lifetime.*** We understand that scheduling and receiving preventive health care can feel daunting while recovering from traumatic events. We also know that life-saving cancer screenings are essential in honoring your long-term health.

Cancer is the leading cause of death for Native women and the second leading cause of death for Native men. ***Early cancer detection improves survival rates, meaning that #CancerScreeningSavesLives.*** We understand that for survivors, certain cancer screenings may be triggering. To help with this, we have compiled tips for making screening and preventive health care more comfortable.

YOUR BODY IS YOUR OWN. YOU HAVE BODY SOVEREIGNTY.

Here are some ways to advocate for your emotional and physical health:

Know what to expect:

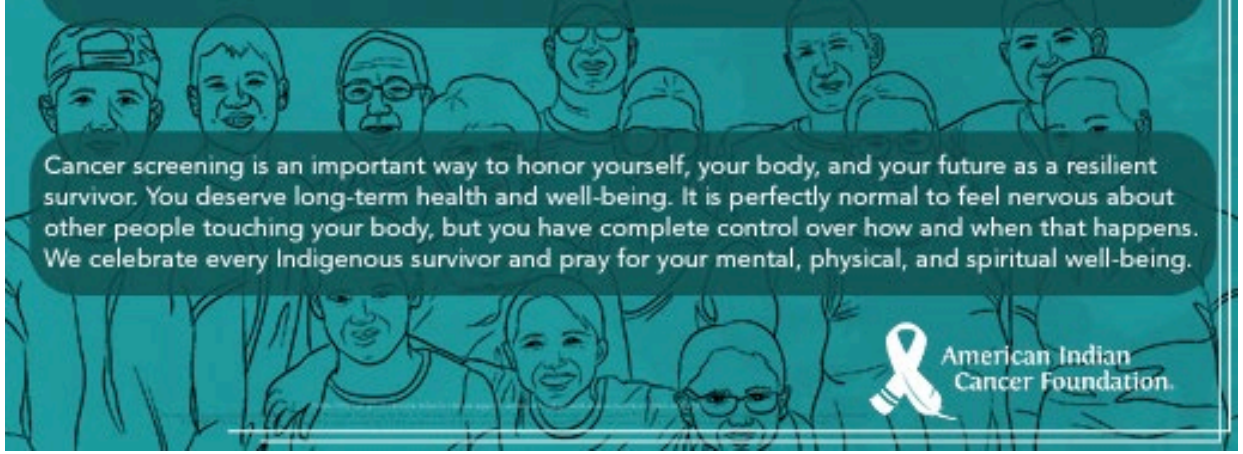
- Talk to your health care team about what cancer screenings are recommended for your age and health history, and what each one entails
- Colonoscopies, mammograms, pap smears, and other screenings may feel invasive, but your health care team can help make them more comfortable
- Ask your health care provider to explain why each step of the screening process is necessary. Your health care provider should explain why they are performing certain exams and what these test results tell them about your health.
- Knowledge is empowering. Asking questions helps to mentally, emotionally, and physically prepare for screening, and is a great way to feel more confident in each step of the process

Advocate for your physical sovereignty:

- Talk to your health care provider about your survivor history if you feel comfortable doing so
- Request that your health care provider narrates each step of the exam as it is performed
- Invite a friend or family member to serve as an emotional support person during the screening
- It is okay to slow or stop an exam or screening at any time
- Inform your health care provider if any part of the screening is uncomfortable or triggering
- Remind yourself that taking care of your health is another way to celebrate your body sovereignty

After your screening:

- Debrief with your health care provider about the exam/screening process. Let them know what did and didn't work for you. This is an opportunity for the provider to document what is most helpful for future exams
- Come up with a screening plan. Know what other preventive screenings are recommended and when you should receive them



Cancer screening is an important way to honor yourself, your body, and your future as a resilient survivor. You deserve long-term health and well-being. It is perfectly normal to feel nervous about other people touching your body, but you have complete control over how and when that happens. We celebrate every Indigenous survivor and pray for your mental, physical, and spiritual well-being.

American Indian Cancer Foundation

FOLLOW US ON SOCIAL MEDIA!

@americanindiancancer

@americanindiancancer

American Indian Cancer Foundation

American Indian Cancer Foundation

Mbuffalo@americanindiancancer.org

www.aicaf.org

American Indian Cancer Foundation®

Ronny A. Bell, PhD

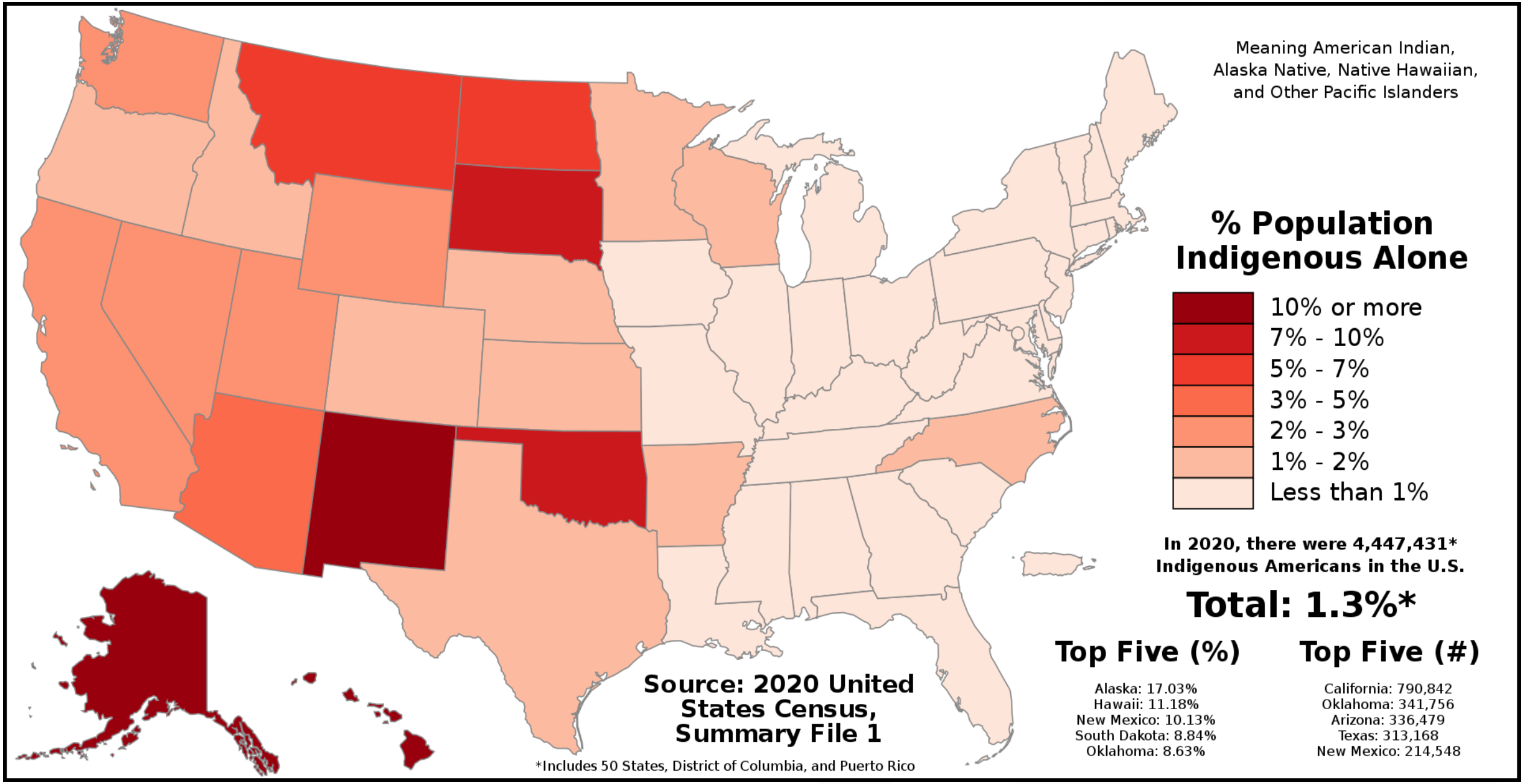
PRESENTER

Fred Eshelman Professor and Chair of the Division of Pharmaceutical Outcomes and Policy at the Eshelman School of Pharmacy at the University of North Carolina at Chapel Hill (UNC) and Associate Director of Cancer Care Access and Excellence for the UNC Lineberger Comprehensive Cancer Center

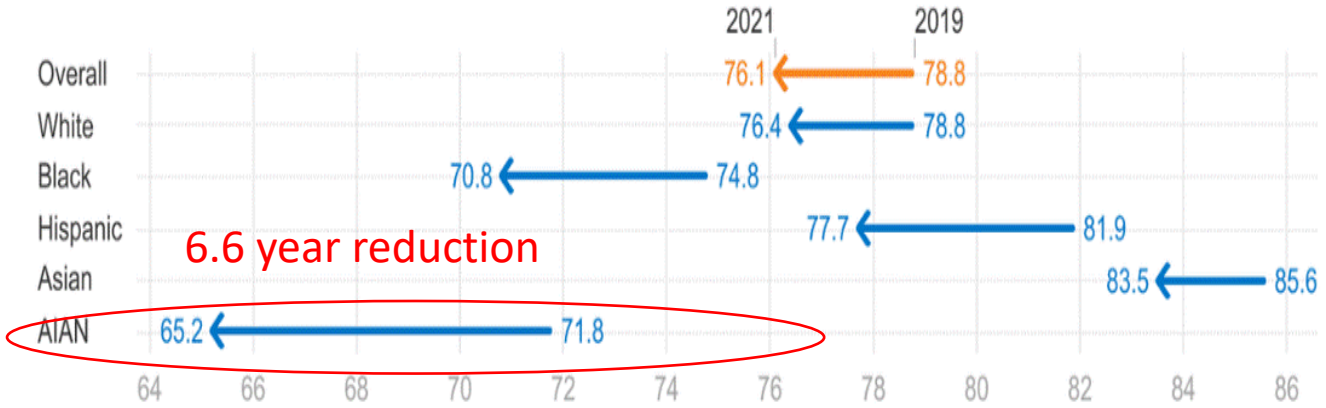
UNC | ESHELMAN SCHOOL OF PHARMACY

HPV Vaccination among American Indians in North Carolina: Prevalence, Perceptions and Potential Research Opportunities

Ronny A. Bell (Lumbee)
Fred Eshelman Professor and Chair
Division of Pharmaceutical Outcomes and Policy


Meaning American Indian, Alaska Native, Native Hawaiian, and Other Pacific Islanders
% Population Indigenous Alone
10% or more
7% - 10%
5% - 7%
3% - 5%
2% - 3%
1% - 2%
Less than 1%
In 2020, there were 4,447,431* Indigenous Americans in the U.S.
Total: 1.3%*
Top Five (%)
Alaska: 17.03%
Hawaii: 11.18%
New Mexico: 10.13%
South Dakota: 8.84%
Oklahoma: 8.63%
Top Five (#)
California: 790,842
Oklahoma: 341,756
Arizona: 336,479
Texas: 313,168
New Mexico: 214,548
Source: 2020 United States Census, Summary File 1
*Includes 50 States, District of Columbia, and Puerto Rico

Life Expectancy in Years by Race/Ethnicity, 2019-2021



KFF NOTE: Estimates based on provisional data for 2021 and final data for 2019 life expectancy at birth. Persons of Hispanic origin may be of any race but are categorized as Hispanic for this analysis; other groups are non-Hispanic.SOURCE: Arias E, Tejada-Vera B, Kochanek KD, Ahmad FB. Provisional life expectancy estimates for 2021. Vital Statistics Rapid Release; no 23. Hyattsville, MD: National Center for Health Statistics. August 2022. DOI: https://dx.doi.org/ 10.15620/cdc:118999.

COVID-19 Cases, Hospitalizations, and Deaths, by Race/Ethnicity

Rate ratios compared to White, Non-Hispanic persons	American Indian or Alaska Native, Non-Hispanic persons	Asian, Non-Hispanic persons	Black or African American, Non-Hispanic persons	Hispanic or Latino persons
Cases[1]	1.8x	0.6x	1.4x	1.7x
Hospitalization[2]	4.0x	1.2x	3.7x	4.1x
Death[3]	2.6x	1.1x	2.8x	2.8x

Race and ethnicity are risk markers for other underlying conditions that affect health, including socioeconomic status, access to health care, and exposure to the virus related to occupation, e.g., among frontline, essential, and critical infrastructure workers.

CORRESPONDENCE

America's "Forgotten" People Experience Devastating Impacts from COVID-19

Ronny A. Bell

NCM NORTH CAROLINA MEDICAL JOURNAL

https://www.ncmedicaljournal.com/content/83/6/467

[Kaiser Family Foundation COVID Disparities]

When does my child need the HPV vaccine?

THE AMERICAN CANCER SOCIETY RECOMMENDS THE HPV VACCINE FOR BOYS AND GIRLS BETWEEN AGES 9 AND 12.

HPV vaccination works best when given between ages 9 and 12. Children and young adults ages 13 through 26 who have not been vaccinated, or who haven't gotten all their doses, should get the vaccine as soon as possible.

The vaccine is given in **two shots**, with 6 to 12 months between shots.*

* 3 shots of the HPV vaccine are needed for children who started the vaccine at age 15 or older, up to age 26.

The HPV vaccine is one of three vaccines that all pre-teens need.
The others are:

- Tdap (tetanus, diphtheria, pertussis) vaccine
- MenACWY (meningitis) vaccine

HPV VACCINATION IS SAFE AND EFFECTIVE.

Scientists and health organizations around the world closely monitor HPV vaccine safety and have found it to be safe and effective.

https://www.cancer.org/cancer/risk-prevention/hpv/hpv-vaccine.html

HPV Vaccination Recommendations

Print

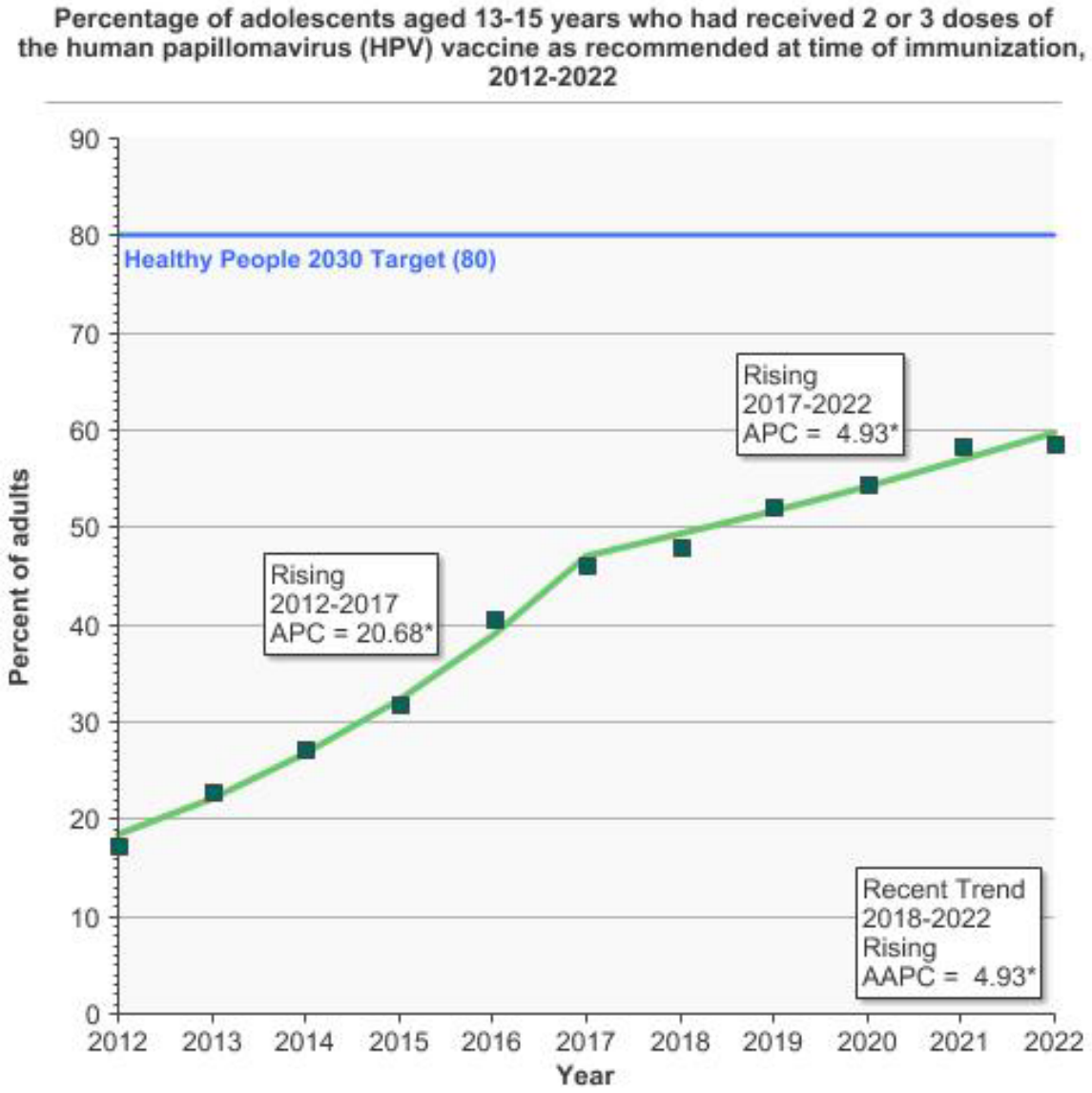
For the full text of CDC's Advisory Committee on Immunization Practices (ACIP) recommendations, see the Human Papillomavirus (HPV) ACIP Vaccine Recommendations.

On This Page

Vaccination Recommendations

- HPV vaccine is recommended for routine vaccination at age 11 or 12 years. (Vaccination can be started at age 9.)
- ACIP also recommends vaccination for everyone through age 26 years if not adequately vaccinated when younger. HPV vaccination is given as a series of either two or three doses, depending on age at initial vaccination.
- Vaccination is not recommended for everyone older than age 26 years. Some adults ages 27 through 45 years might decide to get the HPV vaccine based on discussion with their clinician, if they did not get adequately vaccinated when they were younger. HPV vaccination of people in this age range provides less benefit, for several reasons, including that more people in this age range have already been exposed to HPV.
- For adults ages 27 through 45 years, clinicians can consider discussing HPV vaccination with people who are most likely to benefit. HPV vaccination does not need to be discussed with most adults over age 26 years. See ACIP's shared clinical decision-making FAQs.

https://www.cdc.gov/vaccines/vpd/hpv/hcp/recommendations.html



HP 2030 Target IID-08: Increase the proportion of adolescents who receive recommended doses of the human papillomavirus (HPV) vaccine to 80%
Source: Centers for Disease Control and Prevention, National Center for Immunization and Respiratory Diseases. National Immunization Survey.
Data are not age-adjusted.
Estimates for 2014+ are not directly comparable to estimates from prior years due to a change in the underlying definition. Detailed information can be found in the 'Measure' section of this page.
Weighted regression lines are calculated using the Joinpoint Trend Analysis Software, Version 5.0 May 2023, National Cancer Institute.
The Average Annual Percent Change (AAPC) is a weighted average of the Annual Percent Change (APC) estimates that occur over the specified year range.
* Denotes statistical significance.

Morbidity and Mortality Weekly Report (*MMWR*)

Search

Cancers Associated with Human Papillomavirus in American Indian and Alaska Native Populations — United States, 2013–2017

Weekly / September 18, 2020 / 69(37);1283–1287

Print

Stephanie C. Melkonian, PhD[1]; S. Jane Henley, MSPH[1]; Virginia Senkomago, PhD[1]; Cheryll C. Thomas, MSPH[1]; Melissa A. Jim, MPH[1]; Andria Apostolou, PhD[2]; Mona Saraiya, MD[1] (VIEW AUTHOR AFFILIATIONS)

View suggested citation

Summary

What is already known about this topic?

Human papillomavirus (HPV) causes nearly all cervical cancers and some cancers of the vagina, vulva, penis, anus, and oropharynx. Racial misclassification of American Indian and Alaska Native (AI/AN) populations in cancer registry data results in cancer incidence underestimates.

What is added by this report?

In data from central cancer registries linked with Indian Health Service patient information, 740 (72%) of 1,030 HPV-associated cancers among AI/AN were estimated to be types targeted by 9-valent HPV vaccine. Oropharyngeal cancers were the most common HPV-associated cancers among AI/AN males, and cervical cancers were the most common among AI/AN females.

What are the implications for public health practice?

Surveillance for HPV-associated cancers by region can inform local HPV vaccination and cervical cancer screening efforts targeting AI/AN communities.

https://doi.org/10.1007/s10900-022-01079-3

REVIEW

Barriers and Factors Associated with HPV Vaccination Among American Indians and Alaska Natives: A Systematic Review

Sameer V. Gopalani[1] · Ami E. Sedani[1] · Amanda E. Janitz[1] · Shari C. Clifton[2] · Jennifer D. Peck[1] · Ashley Comiford[3] · Janis E. Campbell[1]

Accepted: 11 February 2022

Abstract

American Indian and Alaska Native (AI/AN) persons bear a disproportionate burden of human papillomavirus (HPV)-associated cancers and face unique challenges to HPV vaccination. We undertook a systematic review to synthesize the available evidence on HPV vaccination barriers and factors among AI/AN persons in the United States. We searched fourteen bibliographic databases, four citation indexes, and six gray literature sources from July 2006 to January 2021. We did not restrict our search by study design, setting, or publication type. Two reviewers independently screened the titles and abstracts (stage 1) and full-text (stage 2) of studies for selection. Both reviewers then independently extracted data using a data extraction form and undertook quality appraisal and bias assessment using the modified Mixed Methods Appraisal Tool. We conducted thematic synthesis to generate descriptive themes. We included a total of 15 records after identifying 3017, screening 1415, retrieving 203, and assessing 41 records. A total of 21 unique barriers to HPV vaccination were reported across 15 themes at the individual (n = 12) and clinic or provider (n = 3) levels. At the individual level, the most common barriers to vaccination–safety and lack of knowledge about the HPV vaccine–were each reported in the highest number of studies (n = 9; 60%). The findings from this review signal the need to develop interventions that target AI/AN populations to increase the adoption and coverage of HPV vaccination. Failure to do so may widen disparities.

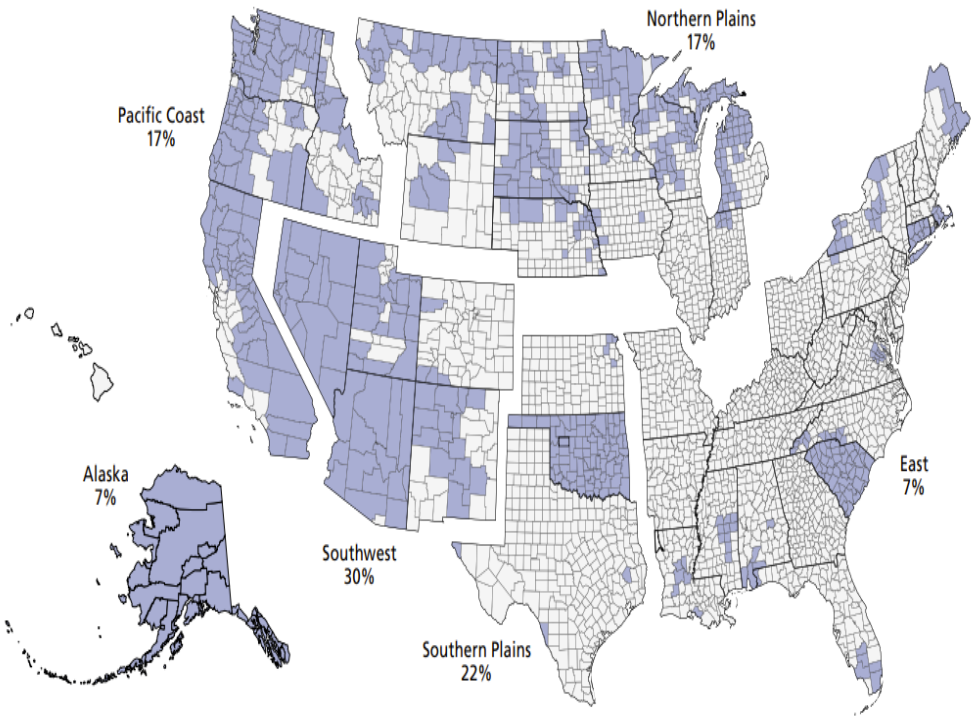
Keywords American Indian · Alaska Native · Native American · HPV vaccination · Systematic review · Cancer prevention

Table S5. Cancer Screening Test Use (%), Vaccination Coverage (%), and Hepatitis Testing (%) by Race, US, 2017-2019

	AIAN	White
Cervical cancer screening, women* 25-65 years (NHIS 2015 & 2018)		
Pap test within past 3 years	77	84
Up-to-date†	84	86
Breast cancer screening (NHIS 2015 & 2018)		
Women 50 to 74 years		
Mammogram within past 2 years (USPSTF)	62	72
Mammogram within past year	46	56
Women ≥45 years		
Up-to-date‡	57	63
Colorectal cancer screening§ (NHIS 2015 & 2018)		
Ages ≥45 years		
Total	48	57
Men	52	58
Women	44	57
Ages ≥50 years		
Total	57	67
Men	60	68
Women	54	66
Ages 50-75 years (USPSTF)		
Total	56	69
Men	60	69
Women	55	68
HPV vaccine utilization, boys and girls 13-17 years (2019)		
≥1 dose	71	68
Up-to-date¶	58	52
Hepatitis B testing, ages ≥18 years (NHIS 2017)		
Has received hepatitis B test	32	30
Hepatitis C testing, ages 48-68 years (NHIS 2017)		
Has received hepatitis C test	21	18

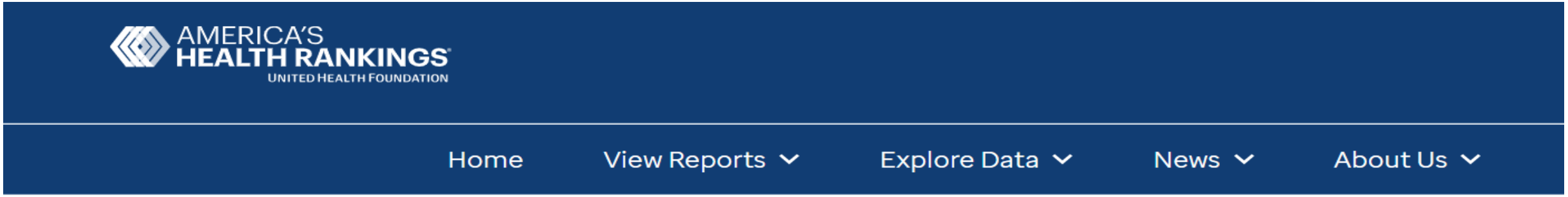
AIAN: American Indian and Alaska Native; HPV: human papillomavirus; USPSTF: United States Preventive Services Task Force. All estimates are age

Figure S1. PRCDA Counties and the Distribution of American Indian and Alaska Native Persons by Region



PCRDA: Purchased/Referred Care Delivery Area. Percentages represent the proportion of the non-Hispanic American Indian/Alaska Native PRCDA population that lives in each region (shown in blue).

Source: US Census Bureau, 2019.



HPV Vaccination in North Carolina

Explore national- and state-level data for hundreds of health, environmental and socioeconomic measures, including background information about each measure. Use features on this page to find measures; view subpopulations, trends and rankings; and download and share content.

How to use this page

North Carolina Value:

54.8%

Percentage of adolescents ages 13-17 who received all recommended doses of the human papillomavirus (HPV) vaccine

North Carolina Rank:

45

https://www.americashealthrankings.org/explore/measures/Immunize_HPV/NC

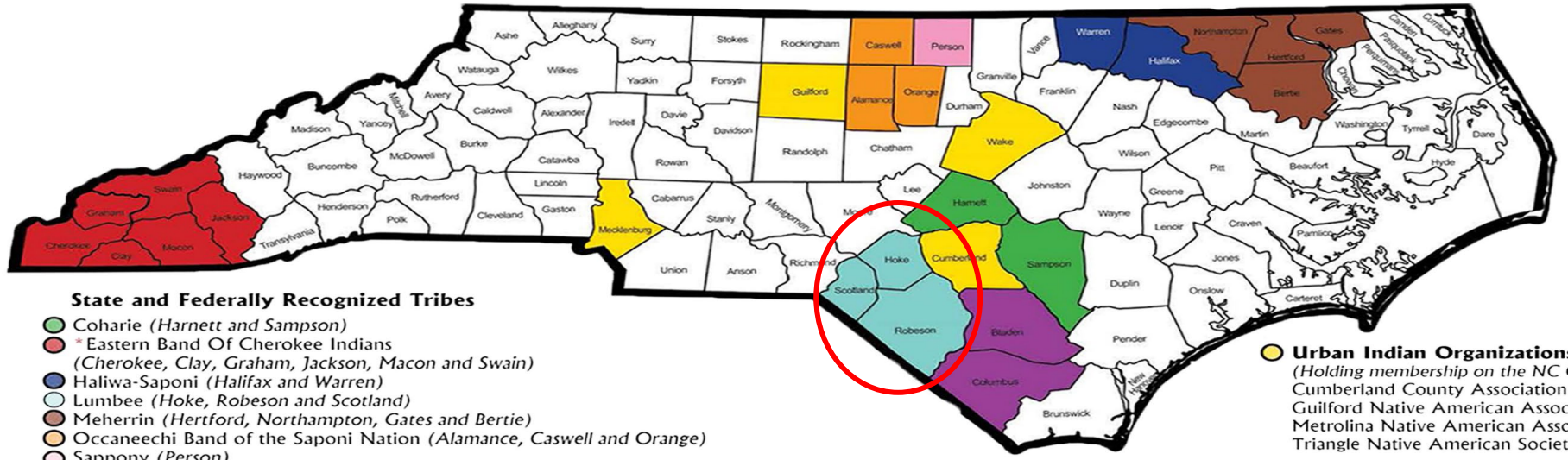
Southeastern American Indian Cancer health Equity Partnership (SAICEP)

A COLLABORATION BETWEEN

Wake Forest School of Medicine
Comprehensive Cancer Center

UNC LINEBERGER COMPREHENSIVE CANCER CENTER

Duke Cancer Institute



State and Federally Recognized Tribes

- Coharie *(Harnett and Sampson)*
- *Eastern Band Of Cherokee Indians *(Cherokee, Clay, Graham, Jackson, Macon and Swain)*
- Haliwa-Saponi *(Halifax and Warren)*
- Lumbee *(Hoke, Robeson and Scotland)*
- Meherrin *(Hertford, Northampton, Gates and Bertie)*
- Occaneechi Band of the Saponi Nation *(Alamance, Caswell and Orange)*
- Sappony *(Person)*
- Waccamaw Siouan *(Bladen and Columbus)*

Federally Recognized

Urban Indian Organizations
(Holding membership on the NC Commission of Indian Affairs):
Cumberland County Association for Indian People
Guilford Native American Association
Metrolina Native American Association
Triangle Native American Society

Map published by the North Carolina Commission of Indian Affairs.

2020

The Southeastern American Indian Cancer Health Equity Partnership (SAICEP) is a unique collaboration initiated by the Community Outreach and Engagement teams at the NCI Comprehensive Cancer Centers at Duke, UNC Lineberger and Wake Forest, with a focus on understanding and addressing the cancer-related health needs of American Indian communities in our catchment areas and beyond.

**** The SAICEP cancer ribbon is representative of the 4 directions in the use of distinctive colors black, red, yellow, and white. The 4 directions can stand for the human races, stages of life, season of the year, aspects of life, elements of nature, animals and ceremonial plants (U.S. National Library of Medicine).*

Cancer health Equity Partnership (SAICEP)
A COLLABORATION BETWEEN

HPV Vaccination Among American Indian Youth in North Carolina

- Similar health disparities for American Indians in North Carolina compared to other regions and nationally
- Limited information on HPV vaccination among American Indians in the southeastern US
  - Cultural norms
- Non-federally recognized tribes are often not represented in national health data for American Indians
  - No access to Indian Health Service health care
  - Racial misclassification

UNC Rural | UNC RESEARCH

2024 Rural Research, Engagement, and Advancement Fund Award Expression of Interest

PROGRAM DESCRIPTION

The Rural Research, Engagement, and Advancement Fund or "RREAF" is co-offered by UNC Rural and the UNC Office of Research Development and promotes community-academic partnerships based in rural North Carolina, supporting a wide range of engagement endeavors, including but not limited to:

- Research
- Technical assistance
- Community leadership development
- Capacity building
- Innovative internships
- Service-learning projects
- Collaborative programs

Vielot Receives K01 Grant to Reduce HPV Vaccination Disparities

July 15, 2024

UNC Family Medicine Assistant Professor Nadja Vielot, PhD, was recently awarded a four-year K01 grant totaling over $620K by the U.S. Department of Health and Human Services Agency for Healthcare Research and Quality. The grant, "Developing and piloting an intervention to reduce human papillomavirus (HPV) vaccination disparities in rural adolescents," aims to improve HPV vaccination rates in rural North Carolinians to reduce the drastic urban-rural disparities in HPV cancer incidence and mortality.

Studies suggest that recommending HPV vaccination at the earliest possible opportunity (at age 9 instead of the universal recommendation

Nadja Vielot, PhD

Español

Vea este sitio en Español

Children's HEALTH OF CAROLINA, PA

WELCOME | PATIENT PORTAL | LOCATIONS | RESOURCES | CONTACT US

LUMBERTON	PEMBROKE	RAEFORD	FAYETTEVILLE	FAIRMONT
400 Liberty Hill Road Lumberton, NC 28358	812 Candy Park Road Pembroke, NC 28372	1940 Club Pond Road Raeford, NC 28376	1738 Owen Drive, Suite 107 Fayetteville, NC 28304	202 Leesville Street Fairmont, NC 28340
910-739-3318	910-521-0201	910-875-8897	910-307-7330	
READ MORE	READ MORE	READ MORE	READ MORE	READ MORE

Children's HEALTH OF CAROLINA, PA

WELCOME | PATIENT PORTAL | LOCATIONS | RESOURCES | CONTACT US

Pembroke Providers

Pediatricians

Joseph Bell, MD

Ginger Locklear, MD
Medical Director

Physician Assistants

Suzette Oxendine, PA-C

Kayla Jacobs, PA-C

Christie Hagan, PA-C

Pilot Project Aims

Specific Aim 1: Identify barriers and facilitators of HPV vaccination among parents of Lumbee youth (n=20) through in-depth interviews.

Specific Aim 2: Characterize health care providers' (n=20) perceptions of HPV vaccination in Lumbee youth through in-depth interviews.

Specific Aim 1

Parent Eligibility Criteria: (1) Identify as Lumbee; (2) Have an age-eligible child (9-17 years); (3) Child is an active patient at a Children's Health of Carolina (CHC) clinic (attended a well child visit in the last 18 months); (4) Willing and able to participate in in-depth (about 45 minutes – one hour)

Recruitment: Collaborate with CHC staff to identify eligible parents and contact them through phone/email communication. Prioritize recruitment at Pembroke and Lumberton sites.

Specific Aim 1

In-depth Interview:

- Accessibility to health care services in the area
- Acceptability of vaccines for their children in general
- Parents' perceived risk of HPV cancers
- Perceptions and Acceptability of the HPV Vaccine

Specific Aim 2

Provider Eligibility Criteria: (1) MD, PA, or NP provider at one of the CHC clinics; (2) Willing and able to be interviewed by the research team (about 45 minutes – one hour).

Recruitment: Collaborate with CHC leadership to identify eligible providers.

Specific Aim 2

In-depth Interview:

- Perceived clinical and systemic barriers to vaccination
- Opportunities for improvement in vaccination efforts
- Factors surrounding HPV vaccination

Data Collection and Analyses

- Basic demographic information will be collected for all study participants
- Interviews will be recorded and transcribed verbatim
- Texts will be read by the study team and coded and summarized for themes using qualitative software

Future Research Directions

- Systematic analyses of CHC EHR data to assess HPV vaccination uptake by race/ethnicity and sex
- Develop and test clinical interventions to increase HPV vaccination
- Create culturally appropriate print and audiovisual educational materials focused on Lumbee youth
- Assess factors associated with uptake of other vaccinations in this population

HPV Vaccination Education and Intervention Resources

American Cancer Society Steps for Increasing HPV Vaccination Practice	Systematic Review of HPV Interventions in Minority Populations
American Indian Cancer Foundation HPV Immunization	UNC Gillings School of Global Public Health Tools to Improve HPV Vaccination in Primary Care
Indian Health Service Immunization Program HPV Toolkit	CDC Preteens Need HPV Vaccine to Prevent Cancer
HPV Vaccination Roundtable 2021 National Meeting	HPV Vaccinations and Native Americans: Protocol for a Systematic Review
DOSE-HPV Study	Effects of Cultural Cues on Perceptions of HPV Vaccination Messages Among Parents and Guardians of American Indian Youth
Promoting HPV Vaccination among American Indian Girls	Barriers to Human Papillomavirus Vaccine uptake among Racial/Ethnic Minorities: A Systematic Review

SOUTHEASTERN AMERICAN INDIAN CANCER HEALTH EQUITY PARTNERSHIP

FREE CME Credits

Live Webinar

November 13
Wednesday
12:00 – 1:00 PM EST/EDT

learn.unclcn.org/11012024

Self-Paced, Online Course

Available in one month after the live webinar.

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Evolution of Native Patient Navigation

Linda Burhansstipanov, MSPH, DRPH, OPN-CG
Founder, Native American Cancer Research Corporation
President, Native American Cancer Initiatives, Incorporated

WEBINAR DESCRIPTION

The session provides an overview of how the field of patient navigation has evolved since its inception in the late 1980s / early 1990s. It includes a brief overview of the nationally recommended metrics and CMS codes for reimbursement of navigation services. It also identifies what is missing in the codes to fully address the cancer continuum.

LEARNING OUTCOMES

- Identify significant improvements in Patient Navigation programs since 1989
- Identify and use Standards' definitions
- Evolution of NACR's Native Patient Navigation Program
- Briefly examine overview of 35 Patient Navigation Metrics
- Identify key events that update CMS, Cpt and other codes for reimbursement of PIN services

These webinars are a collaboration between

Duke Cancer Institute | UNC Lineberger Comprehensive Cancer Center | Atrium Health Wake Forest Baptist

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UNCLCN Website	unclcn.org
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DISCLOSURE STATEMENT

Activity Directors: This activity has been planned and implemented under the sole supervision of the Course Director, Stephanie Wheeler, PhD, MPH, in association with the UNC Office of Continuing Professional Development (CPD). The course director received research support from AstraZeneca (ended June 2023) and Pfizer Medical Foundation (ended December 2023). These financial relationships have been mitigated. CPD staff have no relevant financial relationships with ineligible companies as defined by the ACCME.
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NCPD/CNE: UNC Health is approved as a provider of nursing continuing professional development by the North Carolina Nurses Association, an accredited approver by the American Nurses Credentialing Center's Commission on Accreditation. Criteria for successful completion requires attendance at the NCPD activity and submission of an evaluation within 30 days.

CME: The School of Medicine of the University of North Carolina at Chapel Hill is accredited by the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing medical education for physicians. The School of Medicine of the University of North Carolina at Chapel Hill designates this live internet activity for a maximum of 1.0 AMA PRA Category 1 Credit(s)™. Physicians should claim only the credit commensurate with the extent of their participation in the activity.

Thank You.

UNC | ESHELMAN SCHOOL OF PHARMACY

Jessica Buck DiSilvestro, MD

PRESENTER

Citizen of the Caddo Nation of Oklahoma, Gynecologic Oncologist, Tufts Medical Center

Cervical Cancer: Preventable Deaths Among American Indian/Alaska Native Communities

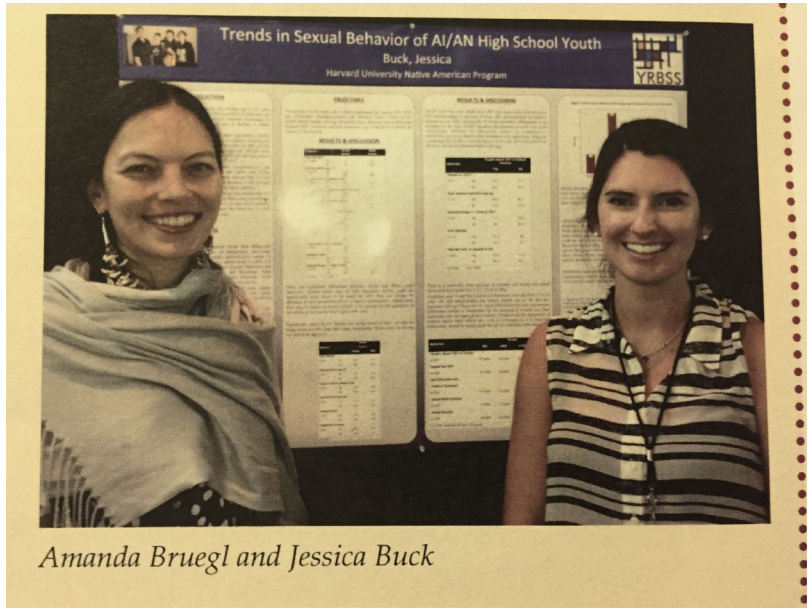
JESSICA BUCK DISILVESTRO, MD

CADDO NATION OF OKLAHOMA

GYNECOLOGIC ONCOLOGIST, TUFTS MEDICAL CENTER, BOSTON, MA

Tufts Medical Center

Mentorship



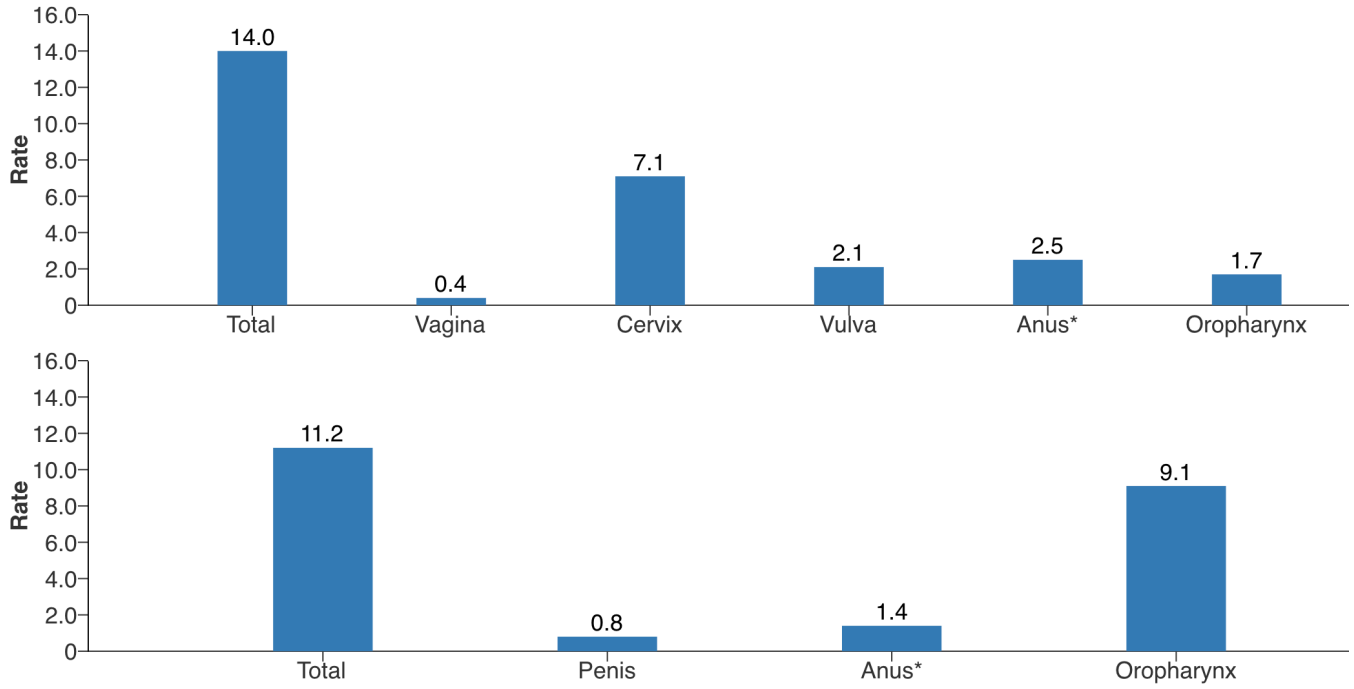
Amanda Bruegl and Jessica Buck

AAIP Conference 2014

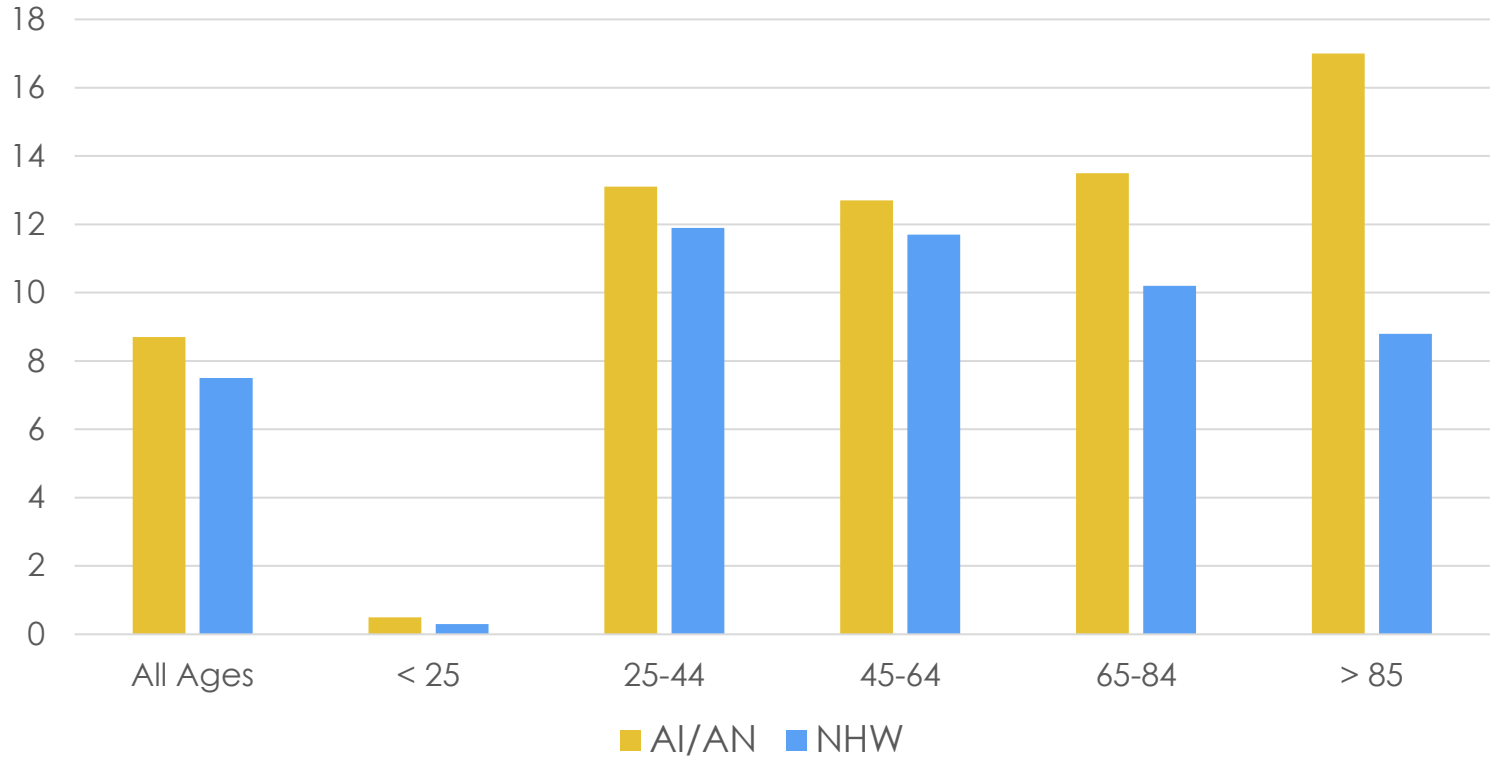
SGO Conference 2023

HPV-Based Cancers

- Between 2017 to 2021, an estimated **47,984 new cases** of HPV-associated cancers were reported in the United States each year
  - **26,280** among females
  - **21,704** among males

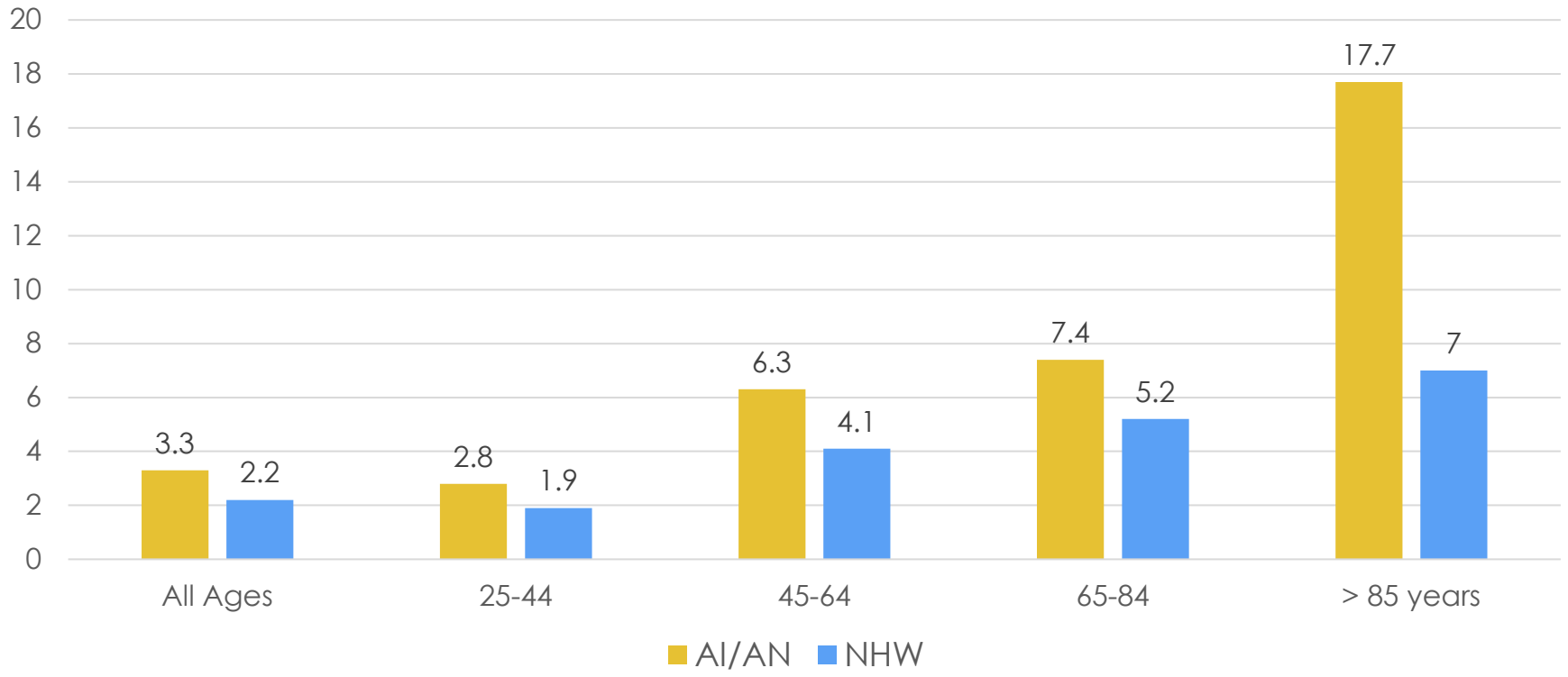


National Cervical Cancer Incidence Among AI/AN Women



Watson et al. Cervical Cancer Incidence and Mortality Among American Indian and Alaska Native Women, 1999-2009. Am J Public Health. S3, 2014, No. S3.

National Cervical Cancer Mortality Among AI/AN Women



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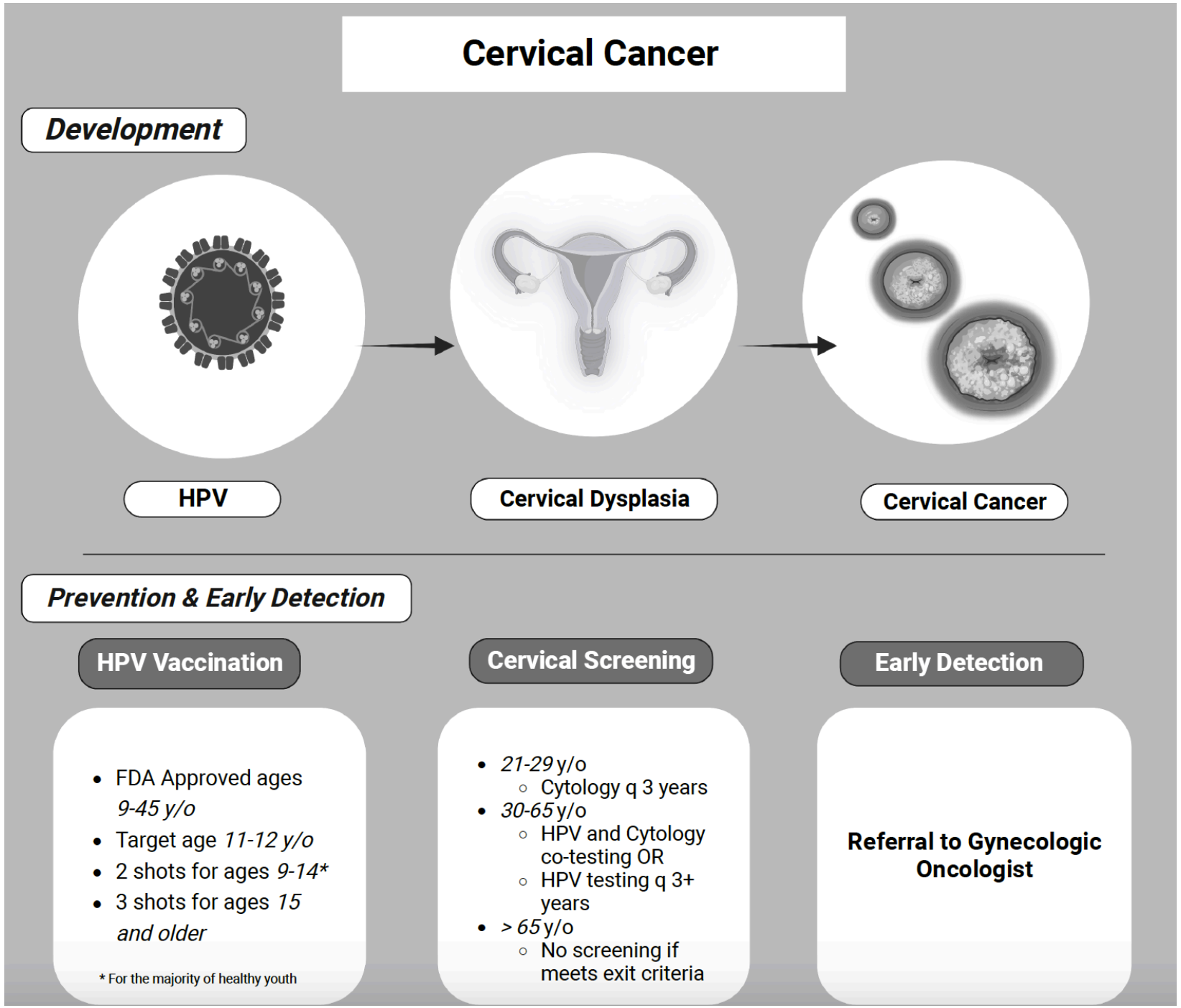


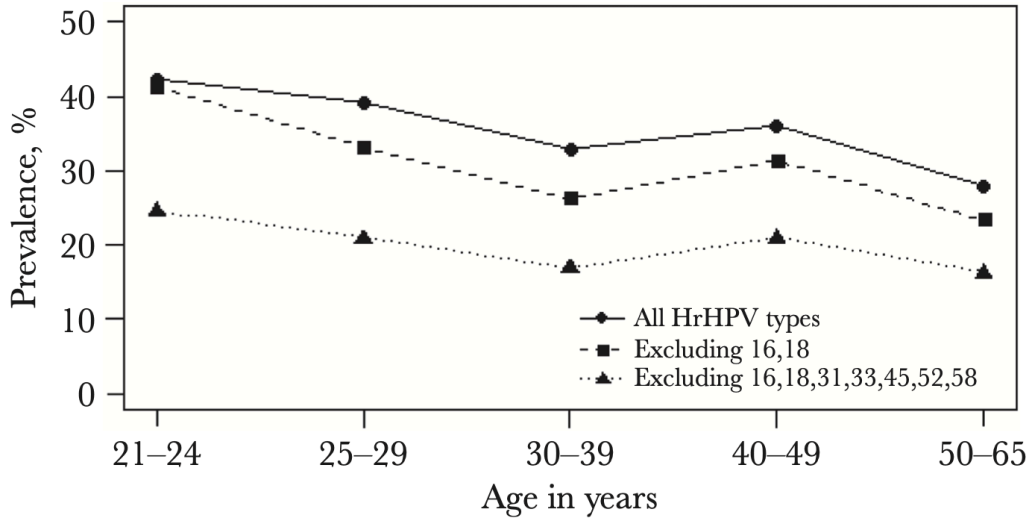
Credit: Madeline Hedges, Undergraduate student
Manuscript - Obstetrics and Gynecology Clinics of North America

Cervical cancer in the AI/AN community

PREVENTION

HPV Infection

- Estimate prevalence of hrHPV in AI/AN: 21-30%
  - Compared to 20% US population
- Rates decrease with increasing age
  - 42% in 21-24 years to 28% in 50-65 years
- Overall, higher rate of hrHPV infection in AI/AN 50+ years
  - **28%** AI/AN vs. **6.9%** general US population



Lee et al 2019

Are AI/AN receiving the HPV vaccine?

Contents lists available at ScienceDirect

Gynecologic Oncology

journal homepage: www.elsevier.com/locate/ygyno

Persistent disparities of cervical cancer among American Indians/Alaska natives: Are we maximizing prevention tools?

A.S. Bruegl [a,*], J. Emerson [a], K. Tirumala [b]

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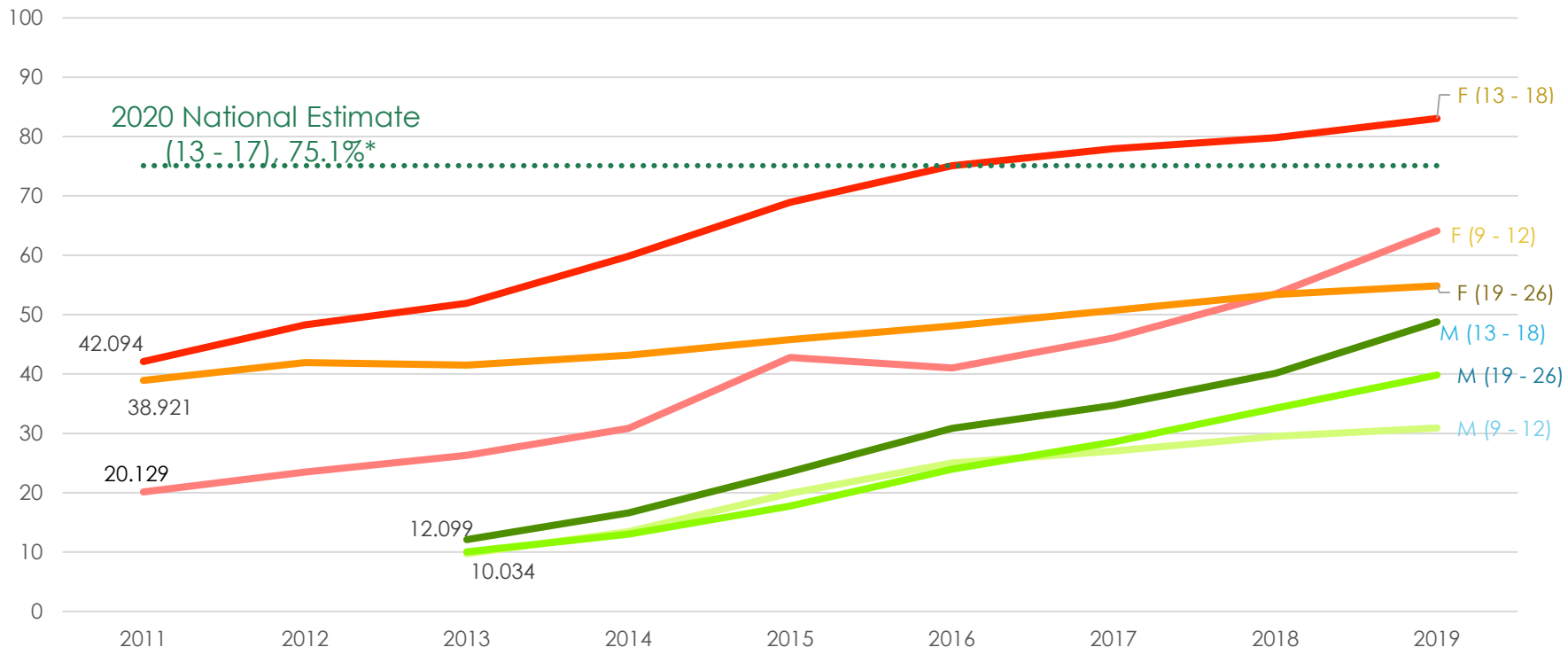
HIGHLIGHTS

- Cervical cancer screening participation among AI/AN women is below the U.S. national average with a range of 57.1–65.0%
- AI/AN women in the age group of 50–64 had the lowest rates of up-to-date cervical cancer screening at 51.2%
- HPV vaccination rates have increased over time with a current completion rate of 58.6%, but remain below national goals

Bruegl 2023

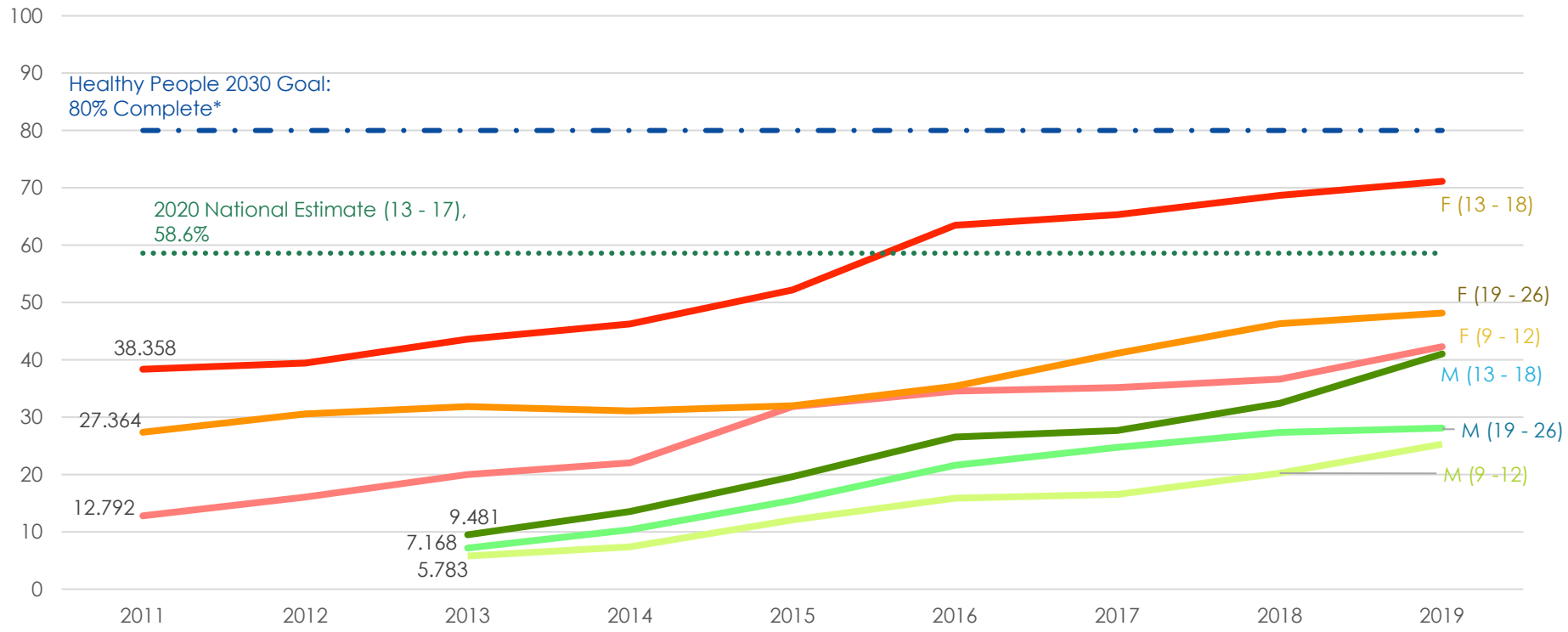
HPV Vaccination: First Dose



Data sources:
* Pingali et al. MMWR. Sept 2020; Vol 70, No. 35

Bruegl 2023

HPV Vaccination: Series Completion



Data sources:
* Pingali et al. MMWR. Sept 2020; Vol 70, No. 35

Bruegl 2023

Are AI/AN receiving the HPV vaccine?

- Below national goal of 80%
- Numbers are increasing
- Males continue to lag behind females

Evidence-based recommendations to reduce cervical cancer disparities

WHAT CAN WE DO?

HOW CAN WE IMPROVE PREVENTION EFFORTS?

Recommendations to reduce cervical cancer disparities

HPV vaccination rates are below Healthy People 2030 Goal

- Designate Elder HPV champions for communities
- Increase access to HPV vaccines at sites that are Native available (schools, powwows, community gatherings)

Recommendations to reduce cervical cancer disparities

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OHSU

NPAIHB
Indian Leadership for Indian Health

Human Papillomavirus (HPV) Vaccination is Cancer Prevention Toolkit

A resource guide for providers of American Indian/Alaska Native patients to prevent the Human Papillomavirus (HPV) associated cancers

OHSU KNIGHT CANCER Institute

NORTHWEST PORTLAND AREA INDIAN HEALTH BOARD
Indian Leadership for Indian Health

Table of Contents

Acronyms used through this toolkit:
HPV = Human Papillomavirus
AI/AN = American Indian/ Alaska Native
CDC = Centers for Disease Control and Prevention

NPAIHB

Facilitators & Barriers to AI/AN Patients Receiving the HPV Vaccine

Factors Associated with Higher Rates of Vaccination:

- HPV knowledge,
- HPV Education
- Provider Trust

Barriers to HPV Vaccination:

- Safety (46.7% of articles),
- Knowledge
- Concerns about sexual activity (33%)

Facilitators & Barriers to AI/AN Patients Receiving the HPV Vaccine

The HPV Vaccine Prevents Cancer

- The HPV vaccine prevents “nearly 100% cases of” genital warts
- The HPV vaccine prevents cervical cancer as well as cancers of the vulva, vagina, mouth, throat, and penis
- The HPV vaccine is more effective in preteens (ages 9 to 12) as preteens produce more antibodies after vaccination than older adolescents do
- The earlier a child is given the HPV vaccine, the earlier a child will be protected from cancer
- Additionally, this vaccine protects children from HPV-caused cancers for a lifetime

Facilitators & Barriers to AI/AN Patients Receiving the HPV Vaccine

Data about Increased Sexual Activity after Vaccination Facts

There is **no published data** to indicate that children increase sexual activity after being vaccinated against HPV

06

Provider Resources for Increasing Rates of HPV Vaccination

Lessons Learned

HPV Series Quality Improvement Project from California's American Academy of Pediatrics'

Preparation

- Provide informational brochures to 9 and 10-year-olds to get them prepared
- Create a roster of 10, 11 and 12-year olds who had not come in for a physical
- Look up patients turning 11 and call them to come in for an appointment

Preparation

- Make each patient's Immunization Record available at the beginning of the visit (and do not leave the exam room to get it)
- Summer Camp or Sports Physical forms: opportunity to look at immunization records and recommend HPV

Clinic Level Tips and Tricks

- Consider adopting tribal clinic standing orders for HPV vaccination
- It is effective for medical assistants to mention the HPV vaccine. …It's taken as coming more from a peer
- When patients are in clinic because of an illness, schedule an "illness follow-up appointment" to vaccinate later'

NPAIHB

06

Provider Resources for Increasing Rates of HPV Vaccination

Messaging to Parents & Caregivers

- Mention HPV first in a list, never last.
  For example, “Today we are vaccinating against HPV, tetanus, diphtheria, and pertussis (Tdap) and meningococcal.”
- Provide parents with proof of long term studies showing vaccine efficacy and safety
- Tell parents: “This vaccine is given at a young age because their immune system works better at this point”
- Congratulate parents for making the correct choice

Messaging for Hesitant Parents and Caregivers

- Give CDC handout to parents who refuse vaccination, then follow up with a phone call
- Use the CDC Vignette written by a father whose daughter had cervical cancer at age 23
- Ask parents who refuse vaccination and reference their own online research
  “what website were you reading?” and provide resources from credible institutions (e.g., CDC, AAP, NCI)

Messaging to Youth

- Emphasize the HPV vaccine as a Cancer Prevention vaccine. Get it now and only get 2 shots
- Talk about the HPV vaccine 3 times: Nurse mentioned when rooming, handed HPV information at the start of the visit, discussed at end of the visit
- Explain that sex is not the only transmission route. Touch is also an HPV transmission route’

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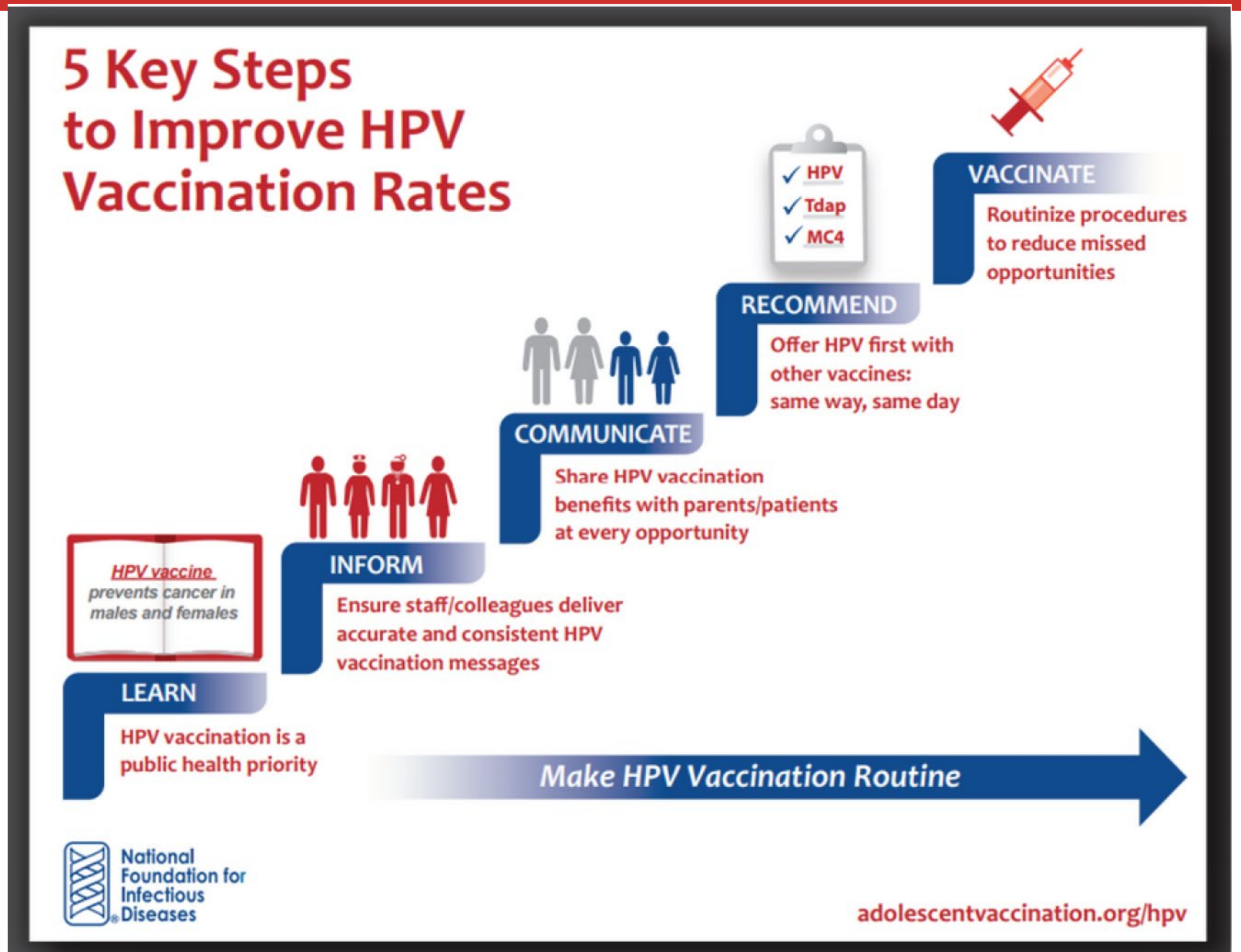
5 Key Steps to Improve HPV Vaccination Rates



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Frequently Asked Questions

Question	Answer
If someone is age 15 years or older and started the vaccination series at age 11 but only received one dose then, how many more doses do they need now?	This person needs one more dose to complete a 2-dose series, which is recommended because the vaccination series was started before their 15th birthday. In a 2-dose series, the second dose is recommended 6–12 months after the first dose, but there is no upper time limit. In this case, the first dose was given several years ago, so the second dose can be given right away.
What is the recommendation for persons with immunocompromising conditions?	The CDC recommends three doses of the HPV vaccine (0, 1–2, 6-month schedule) for people ages 9–26 years if they have certain immunocompromising conditions. People whose immune responses might be lower, for example, due to HIV infection, cancer, transplantation, autoimmune disease, or taking immunosuppressant medications, should receive three doses to make sure they get the most benefit. However, children with asthma, diabetes, and other conditions that do not suppress immune responses to vaccination can receive a 2-dose schedule.
If the vaccine series was started with a previous HPV valent vaccine, what are the intervals for the remaining doses in a 3-dose or 2-dose series?	Any licensed HPV vaccine can be used to complete the vaccination series with the same recommended schedule and dosing intervals. • If the first dose of any HPV vaccine was given before the 15th birthday, vaccination should be completed according to a 2-dose schedule. In a 2-dose series, the second dose is recommended 6–12 months after the first dose (0, 6–12-month schedule). • If the first dose of any HPV vaccine was given on or after the 15th birthday, vaccination should be completed according to a 3-dose schedule. In a 3-dose series, the second dose is recommended 1–2 months after the first dose, and the third dose is recommended 6 months after the first dose (0, 1–2, 6-month schedule). • If the vaccination schedule is interrupted, vaccine doses do not need to be repeated
Should adults ages 27-45 years be vaccinated against HPV?	HPV vaccination provides the most benefit when given before a person is exposed to any HPV. This is why CDC recommends HPV vaccination for ages 11–12 years. HPV vaccination is recommended throu 26 years for everyone who receives the vaccine. It is FDA approved for individuals through age 45.

NPAIHB

Recommendations to reduce cervical cancer disparities

Non-AI/AN providers are seeing AI/AN patients

- Increase number of AI/AN healthcare providers

AI/AN comprise 2.5% of population, but only 0.3% of physician workforce

ASSOCIATION OF AMERICAN INDIAN PHYSICIANS

Recommendations to reduce cervical cancer disparities

Informational materials and messaging are not tailored to the AI/AN population

- Provide AI/AN specific outreach, advertising & handouts
- More education during training for non-Native physicians
- Community driven health campaigns and partnership with IHS providers and/or traditional healers

American Indian Cancer Foundation®

Recommendations to reduce cervical cancer disparities

Participation in cervical cancer screening programs is below Healthy People 2030 Goal	• Engage with community stakeholders/champions to increase cervical cancer and promote screening • Standardizing cervical cancer screening to all eligible AI/AN individuals • Provide gynecologic trauma informed care training to all providers caring for AI/AN individuals
Colposcopy trained providers are not on-site at IHS/Tribal/Urban Indian clinics and follow-up requires travel and time	• Designate staff to participate in the IHS colposcopy training and provide service on-site

Recommendations to reduce cervical cancer disparities

Per capita funding for IHS remains below that of other government sponsored healthcare

- Increase cervical cancer screening and treatment funding

<u>Per capita allocation:</u>
IHS: $9,726
Veterans: $13,500
Medicare: $15,727

Recommendations to reduce cervical cancer disparities

Research related to AI/AN population and cervical cancer and its prevention remains understudied

- Increase NIH designated funding by and with Tribes to identify culturally specific and evidence-based solutions

Cancer Causes & Control
https://doi.org/10.1007/s10552-023-01799-4

REVIEW

Persistent cervical cancer disparities among American Indian/Alaska Native women: a systematic scoping review exploring the state of the science in this population

Katherine C. Fitch[1] · Christine G. T. Nguyen[1] · Cirila Estela Vasquez Guzman[2] · Rebecca S. Holmes[2] · Amanda S. Bruegl[1]

Kristine Sprigler

CERVICAL CANCER SURVIVOR

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Moderated Discussion

Ronny A. Bell, PhD

Jessica Buck DiSilvestro, MD

Melissa Buffalo

Kristine Sprigler

stjude.org/hpv • #EndHPVCancers

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Closing Remarks

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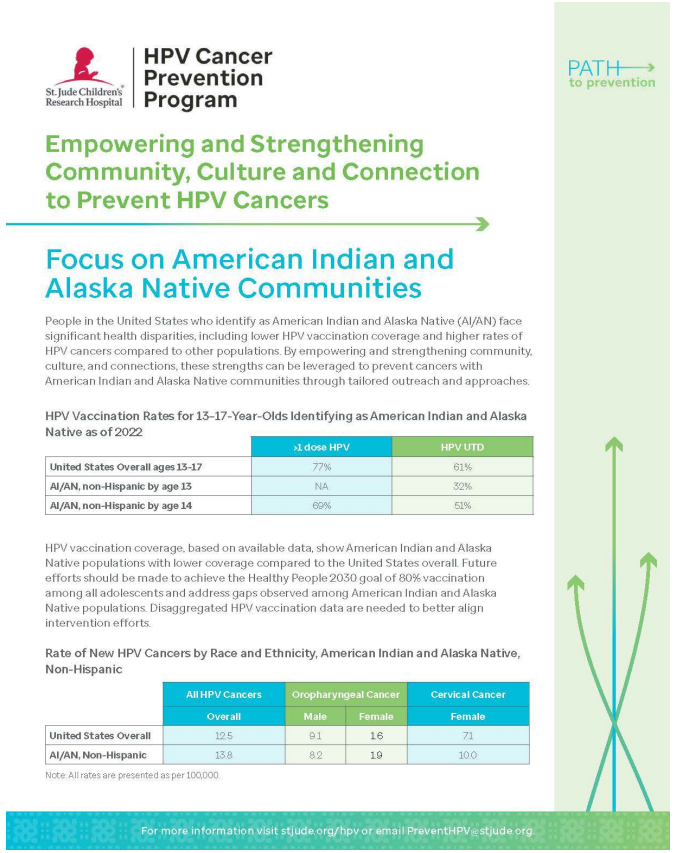
Factsheet – Improving HPV Vaccination Coverage With a Focus on American Indian and Alaska Native Communities



St. Jude Children's Research Hospital | HPV Cancer Prevention Program

PATH to prevention

Empowering and Strengthening Community, Culture and Connection to Prevent HPV Cancers

Focus on American Indian and Alaska Native Communities

People in the United States who identify as American Indian and Alaska Native (AI/AN) face significant health disparities, including lower HPV vaccination coverage and higher rates of HPV cancers compared to other populations. By empowering and strengthening community, culture, and connections, these strengths can be leveraged to prevent cancers with American Indian and Alaska Native communities through tailored outreach and approaches.

HPV Vaccination Rates for 13–17-Year-Olds Identifying as American Indian and Alaska Native as of 2022

	≥1 dose HPV	HPV UTD
United States Overall ages 13–17	77%	61%
AI/AN, non-Hispanic by age 13	NA	32%
AI/AN, non-Hispanic by age 14	69%	51%

HPV vaccination coverage, based on available data, show American Indian and Alaska Native populations with lower coverage compared to the United States overall. Future efforts should be made to achieve the Healthy People 2030 goal of 80% vaccination among all adolescents and address gaps observed among American Indian and Alaska Native populations. Disaggregated HPV vaccination data are needed to better align intervention efforts.

Rate of New HPV Cancers by Race and Ethnicity, American Indian and Alaska Native, Non-Hispanic

	All HPV Cancers	Oropharyngeal Cancer		Cervical Cancer
	Overall	Male	Female	Female
United States Overall	12.5	9.1	1.6	7.1
AI/AN, Non-Hispanic	13.8	8.2	1.9	10.0

Note: All rates are presented as per 100,000.

For more information visit stjude.org/hpv or email PreventHPV@stjude.org

Access the factsheet by scanning the QR code or using the link provided in the chat.

Empowering and Strengthening Community, Culture and Connection

Access recordings of other seminars in this series by scanning the QR code or using the link provided in the chat.

May 14, 2024: Understanding HPV Vaccination and HPV Cancer Disparities among Asian Americans and Pacific Islanders

October 2, 2024: Vacunación Sin Barreras - Addressing HPV Vaccination Inequities and HPV Cancer Disparities in Hispanic and Latino Communities

Next in the ESC Seminar Series

Addressing HPV Vaccination Inequities and HPV Cancer Disparities in African American and Black Communities

Thursday, February 20, 2025
12:00 PM - 1:15 PM CST

Evaluation

Please take a brief moment to complete an evaluation of today's seminar. Your feedback is important to us and will be used to plan future offerings.

Thank you for attending!

For more information, please email PreventHPV@stjude.org or visit stjude.org/hpv.

stjude.org/hpv • #EndHPVCancers