Washington State Department of Health

2017 WA IMMUNIZATION COVERAGE

VAC – October 18, 2018

CDC's National Immunization Survey (NIS)

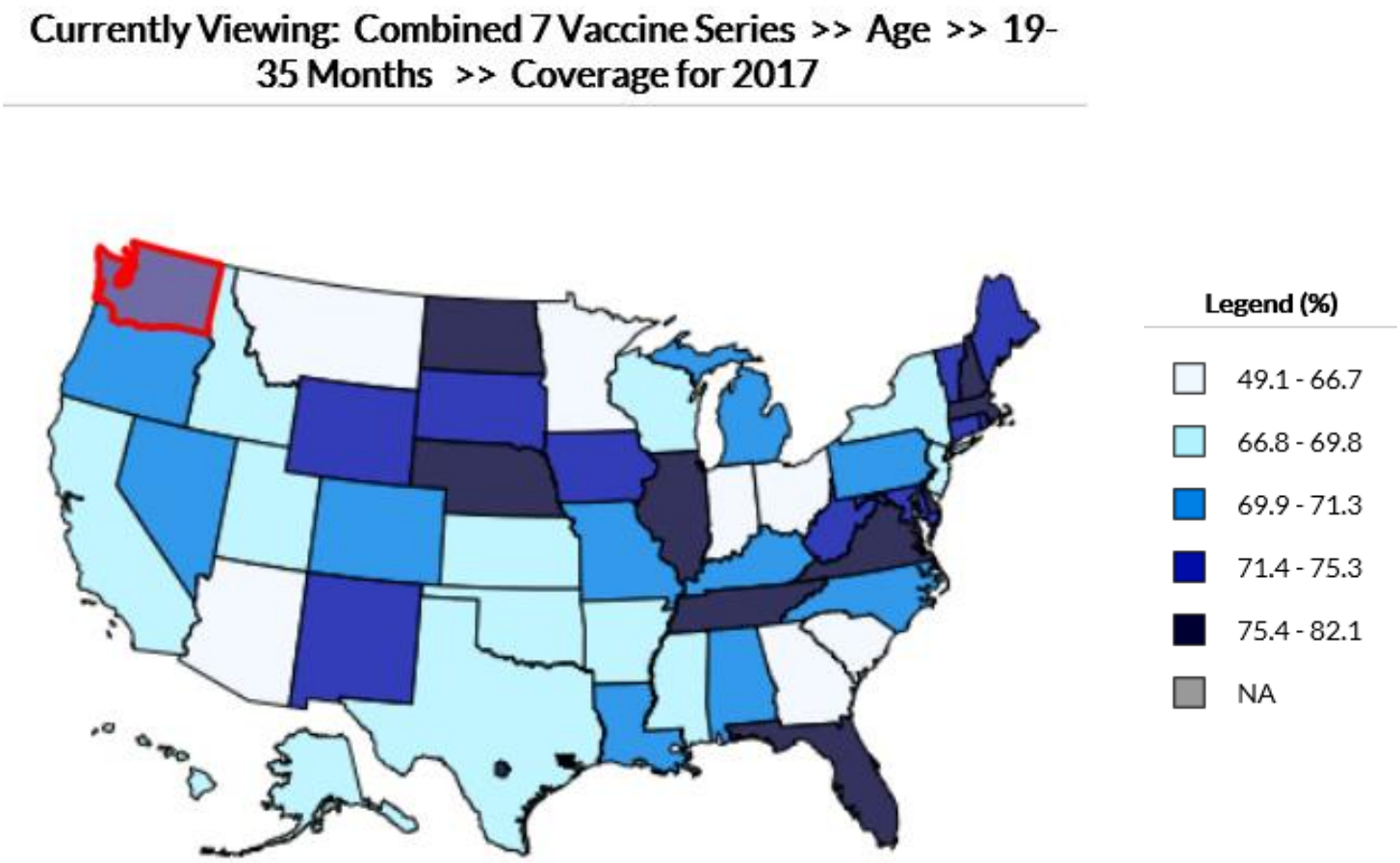
- Annual dual frame telephone (cell, landline) survey with mailed survey of vaccination providers
- Collects socio-demographics, health insurance status, vaccines administered (parent and provider reported)
- Full year data available since 1995 for ages19-35 months and 2006 for teens (ages 13-17 years)
- Immunization coverage available for the United States, U.S. regions, and states
- Primary data use
  - Compare state immunization coverage
  - Healthy People 2020 goals
  - Annual CDC vaccination coverage awards

WA Immunization Information System (IIS)

- State-wide web based Immunization System
- Population health data starting in 2004
- A majority of the state population has a record in the WAIIS
  - 97% of children aged 0-6
- Includes immunization records for over 8 million people
- Immunization data comes from over 2,100 organizations
- Not directly comparable to NIS
  - Sample vs. population based
  - All vaccines vs. valid vaccines only

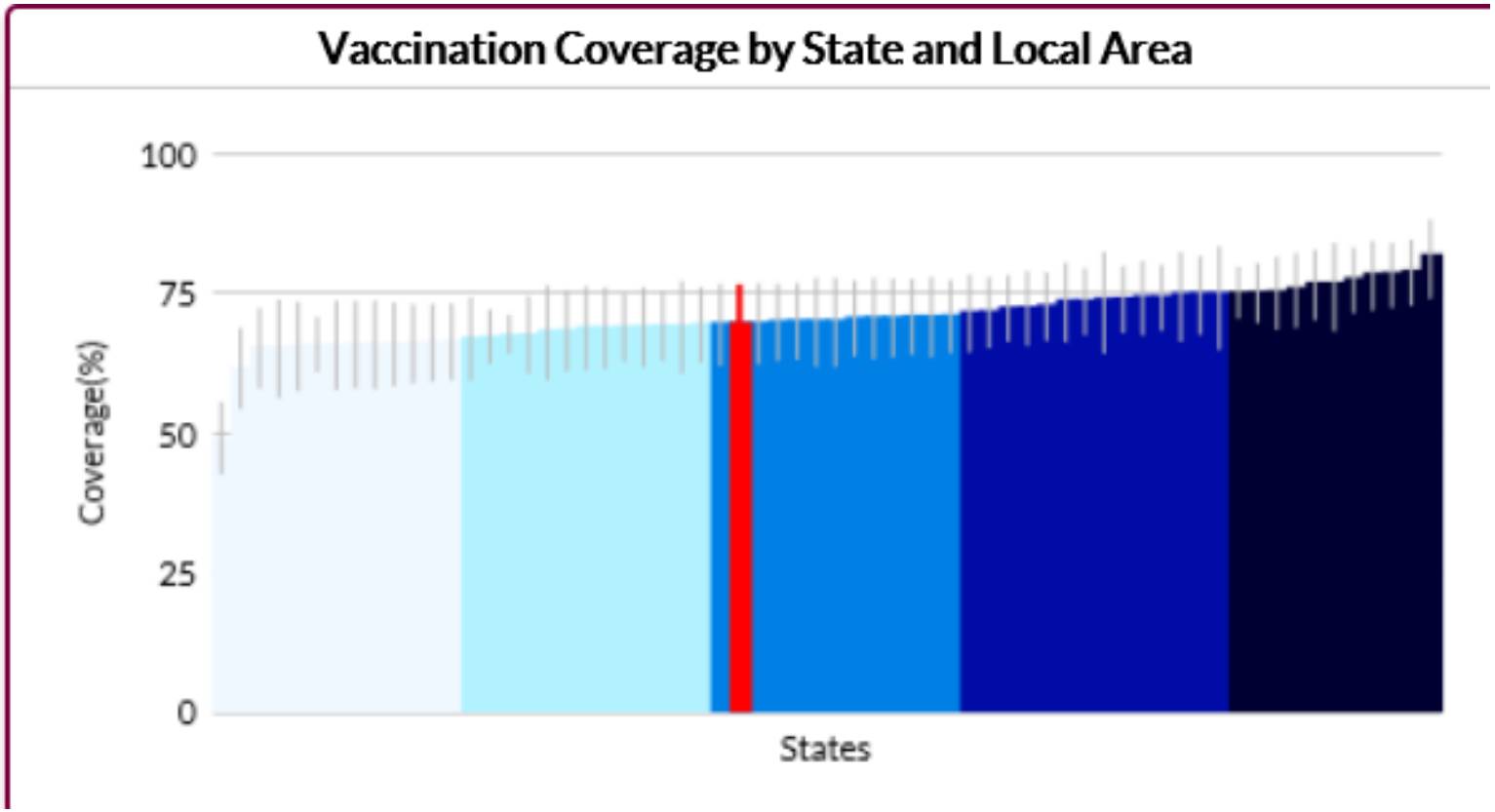
Childhood (19 to 35 months)

NIS Immunization Coverage Among 19-35 month olds, United States 2017



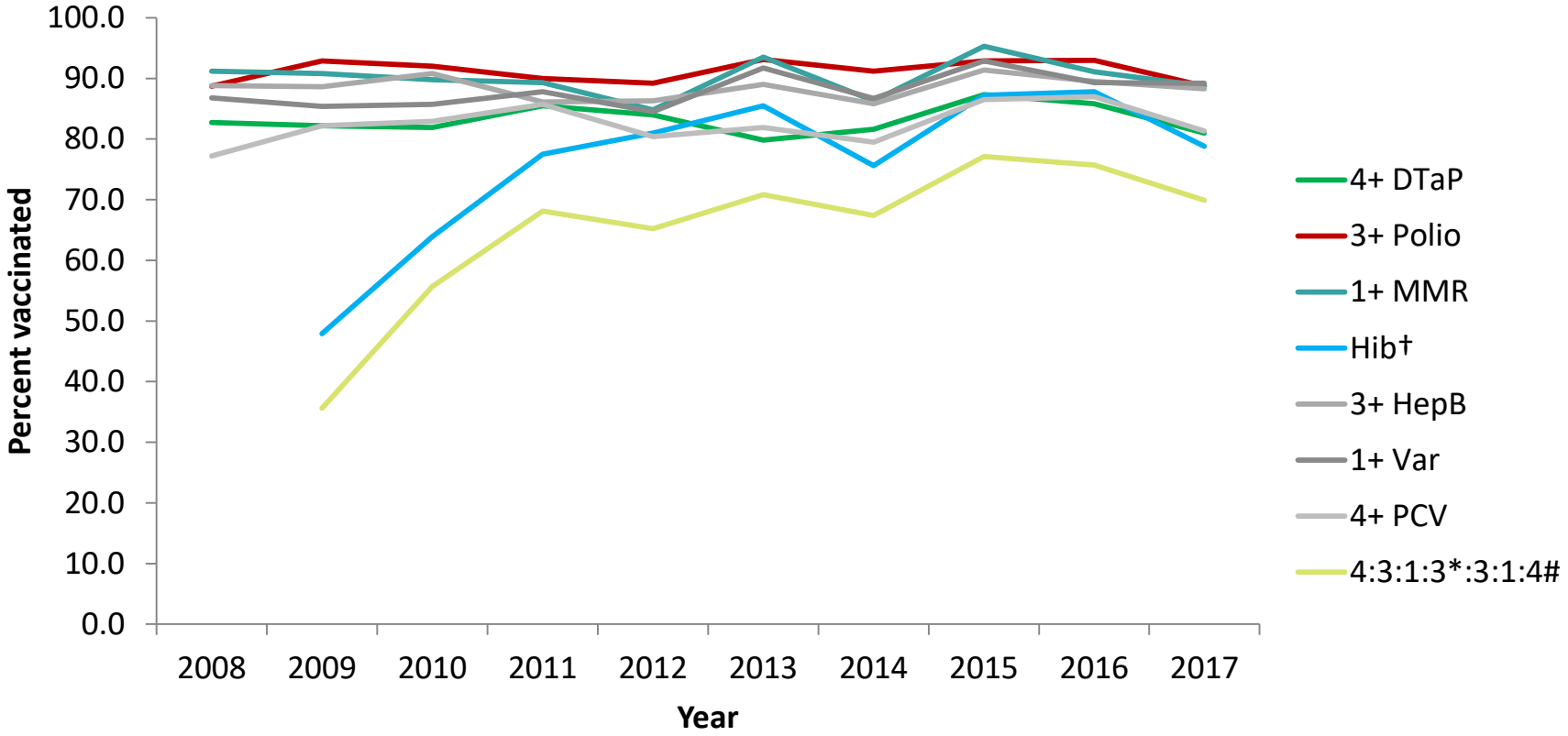
Washington 69.9% (±7.2)

NIS Immunization Coverage Among 19-35 month olds, United States 2017



https://www.cdc.gov/vaccines/imz-managers/coverage/childvaxview/data-reports/7-series/reports/2017.html

NIS Immunization Coverage Among 19-35 month olds, WA 2008-2017

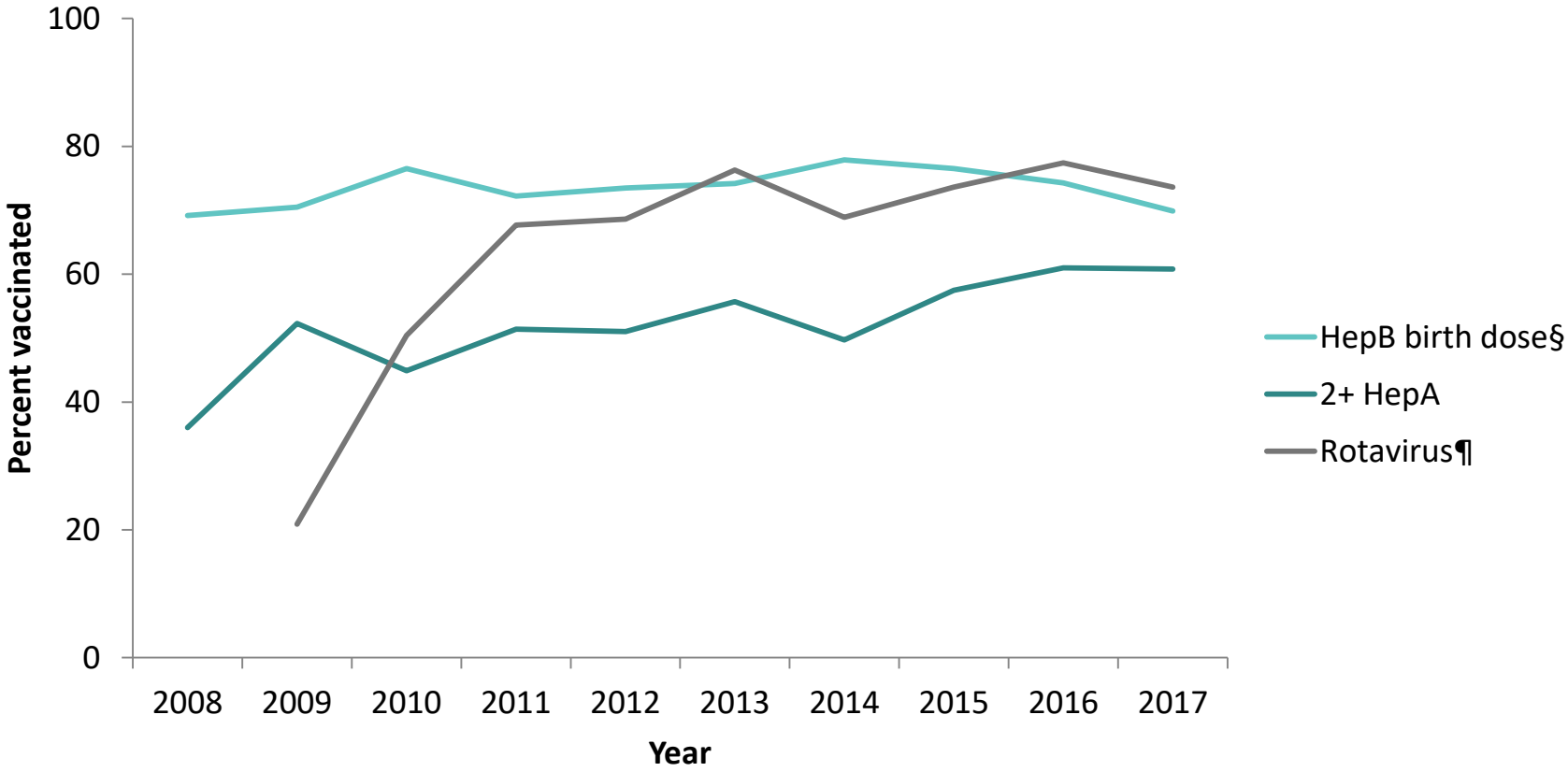


* HP2020 target for the 4:3:1:3*:3:1:4 series is 80%.

† 3 or 4 doses of Haemophilus influenzae type b conjugate vaccine, depending on vaccine type

4+ DTaP, 3+ polio, 1+ MMR, 3 or 4 doses Hib, depending on vaccine type, 3+ HepB, 1+ varicella, and 4+ PCV.

NIS Immunization Coverage Among 19-35 month olds, WA 2008-2017

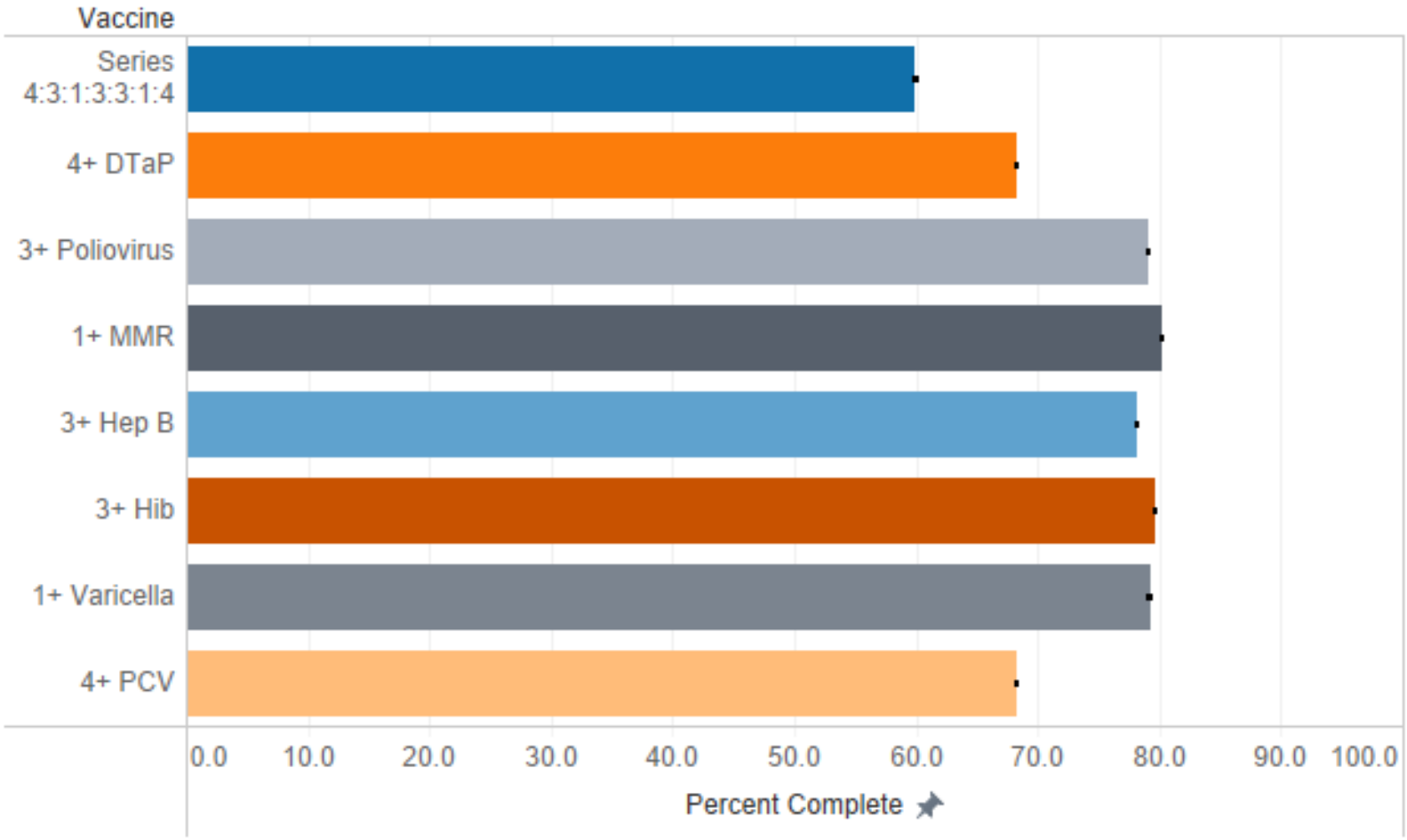


* HP2020 target for HepA and the birth dose of HepB is 85%. Target for rotavirus is 80%.
§ Coverage estimates by birth cohort. Estimates presented are for children born in 2006-2015.
¶ 2 or 3 doses, depending on vaccine type.

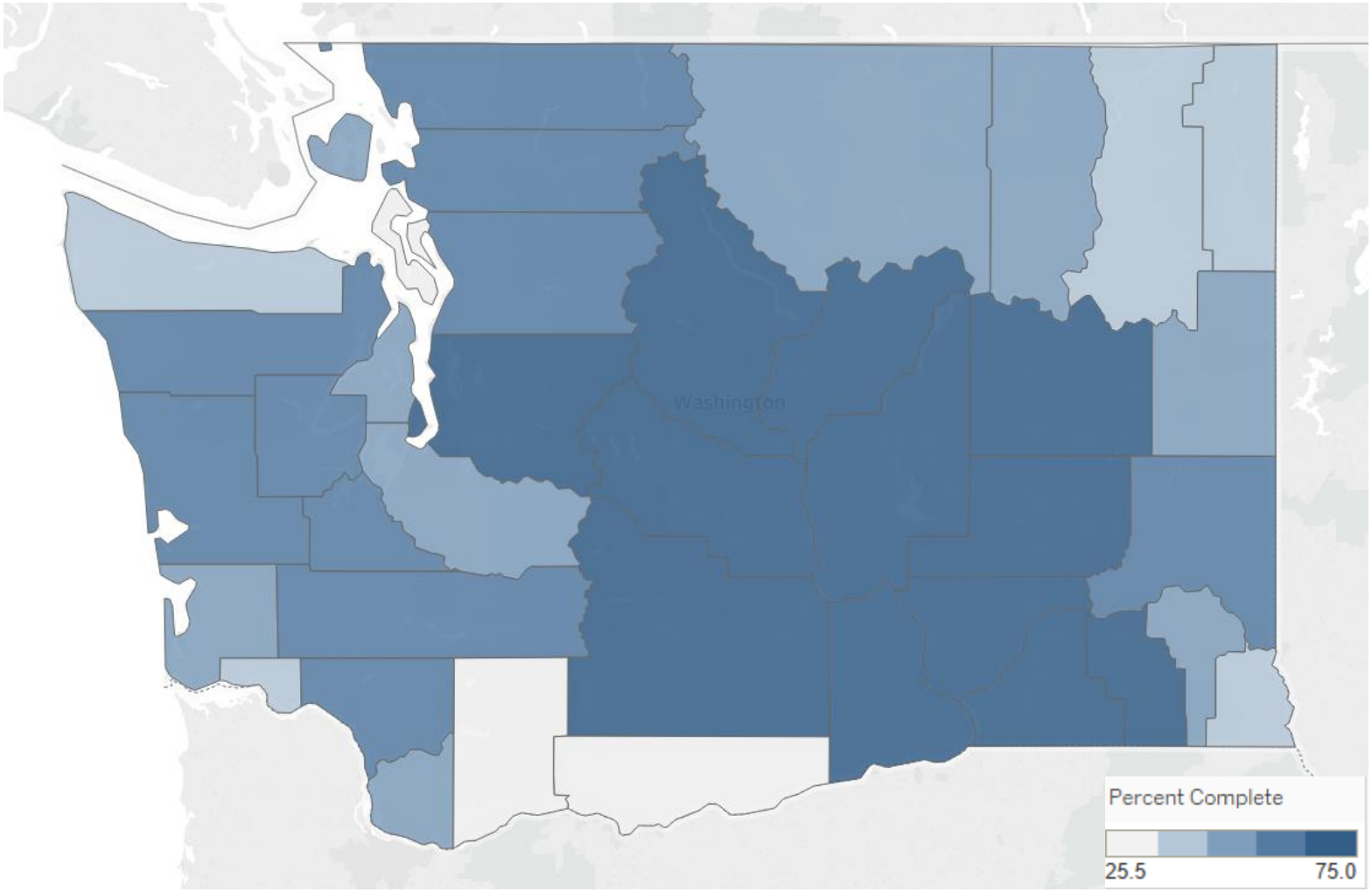
WA NIS Summary

- Most of WA's individual rates are similar to national average in 2017
- Overall, Washington's rates of childhood vaccination coverage have not changed in the past ten years
- Rates for Hib, HepA, Rotavirus and the 4:3:1:3:3:1:4 have significantly increased compared to 2008-2010
- Two vaccines decreased significantly in 2017
  - Hib: (87.8%, ±4.2 to 78.8%, ±6.5)
  - Hep B birth dose (77.5%, ±5.4 to 67.4%, 59.8-74.1)
    - Nationally, Hep B birth dose significantly increased in 2017

WA IIS Immunization Coverage Among 19-35 month olds, WA 2017



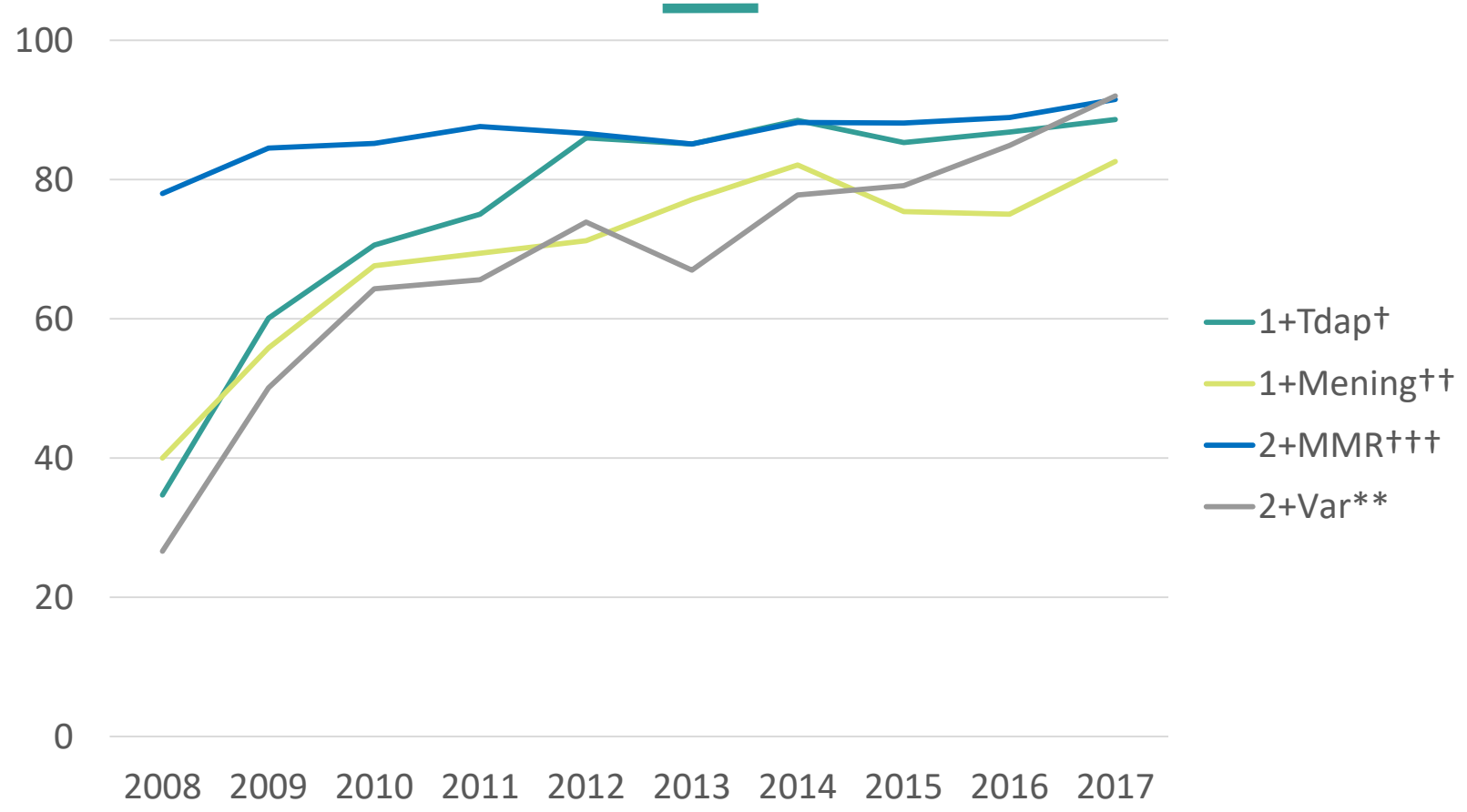
WA IIS Immunization Coverage Among 19-35 month olds by County, WA 2017



Teens (13-17 years)

TDAP
MENINGICOCCAL
MMR
VARICELLA
HPV

NIS Teen Immunization Coverage Among 13-17 Year Olds, WA 2008-2017



† ≥1 dose of tetanus toxoid, reduced diphtheria toxoid, and acellular pertussis (Tdap) since age 10 years
†† ≥1 dose of meningococcal conjugate vaccine (MenACWY) or meningococcal -unknown type vaccine
††† ≥2 doses of measles, mumps, and rubella vaccine
** ≥2 doses of varicella vaccine among adolescents without a reported history of varicella disease

NIS HPV Immunization Coverage Among 13-17 Year Olds, WA 2008-2017

§ ≥1 dose of human papillomavirus (HPV) vaccine, either quadrivalent or bivalent. Percentages reported among females only
‡ ≥1 dose of HPV vaccine, quadrivalent. Percentage reported among males only.
++HPV UTD includes those with ≥ 3 doses , and those with 2 doses when the first HPV vaccine dose was initiated prior to age 15 years and there was at least five months minus four days between the first and second dose as specified by Clinical Decision for Immunization (CDSi)

NIS-Teen Results for Select Vaccines 13-17 Year Olds, 2016-2017

Vaccine	WA 2016	WA 2017	National 2017
≥1 Tdap	86.8 (±4.6)	88.6 (±4.1)	88.7 (±1.8)
≥1 Meningococcal ACWY	75.1 (±15.8)	82.6 (±4.9)	85.1 (±1.9)*
≥2 MMR	88.9 (±4.2)	91.5 (±3.4)	92.1 (±1.5)*
≥2 Varicella	84.9 (±5.6)	92.0 (±3.3)*	88.6 (±1.9)*

*indicates statistically significant ($p<0.05$) increase from 2016-2017

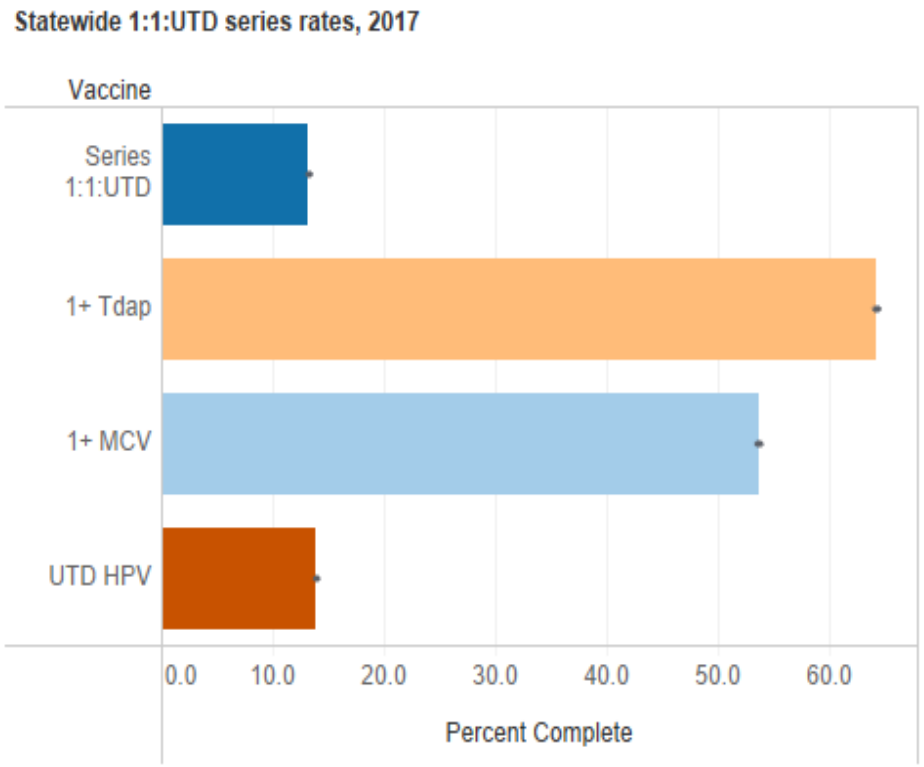
- All WA rates below the 95% needed for herd immunity
- Coverage for Tdap and meningococcal ACWY vaccines both surpass the HP2020 goal of 80%
- Washington's two dose varicella vaccine rate has increased to 92%, surpassing the HP2020 goal of 90%

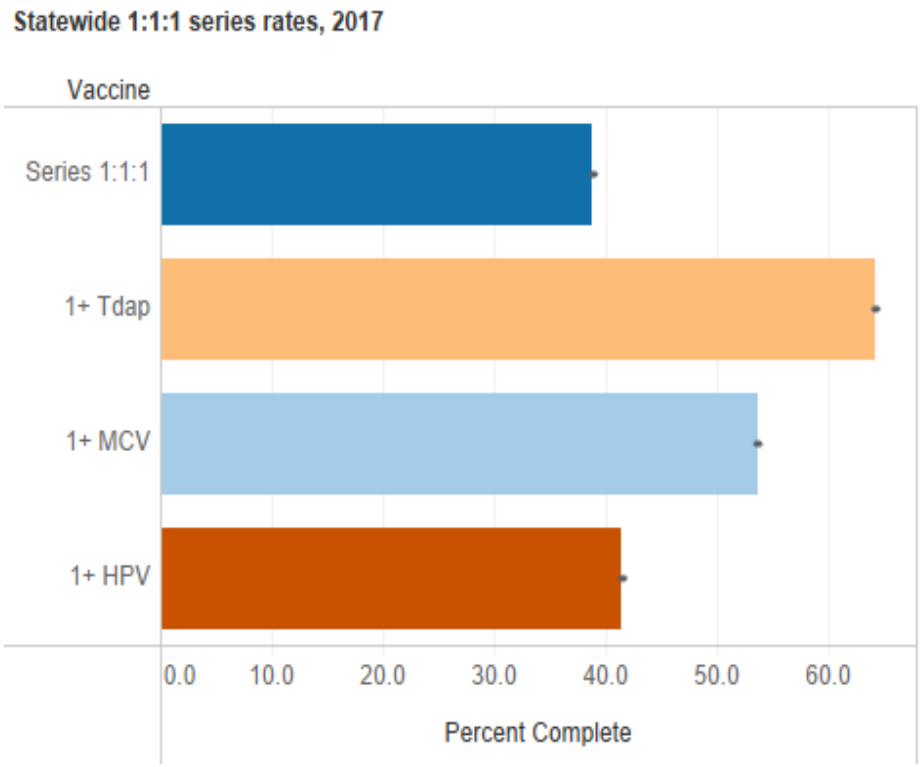
NIS-Teen Results for HPV
13-17 Year Olds, 2016-2017

Vaccine	WA 2016	WA 2017	US 2017
Combined			
≥1 HPV All	64.8 (±6.0)	71.9 (±5.7)	65.5 (±2.4)*
HPV UTD All	49.5 (±6.5)	55.2 (±6.3)	48.6 (±2.6)*
Females			
≥1 HPV	70.9 (±8.0)	72.6 (±8.1)	68.6 (±3.3)*
HPV UTD	55.2 (±9.3)	56.8 (±8.8)	53.1 (±3.8)*
Males			
≥1 HPV	58.9 (±8.8)	71.2 (±8.2)*	62.6 (±3.3)*
HPV UTD	44.0 (±8.9)	53.7 (±9.1)	44.3 (±3.4)*

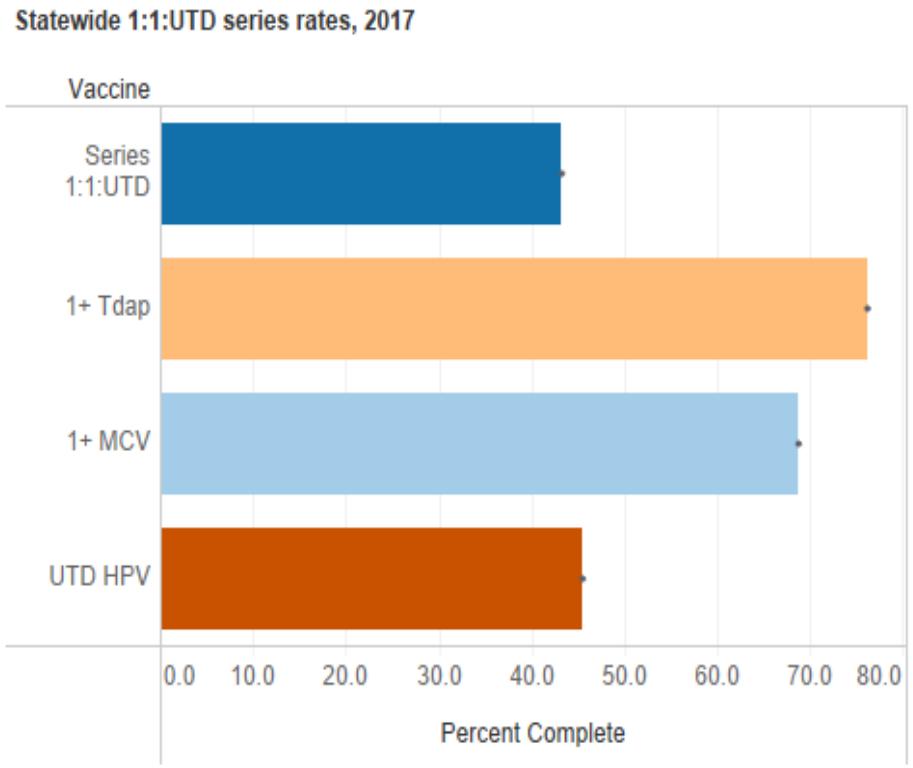
*indicates statistically significant ($p<0.05$) increase from 2016-2017

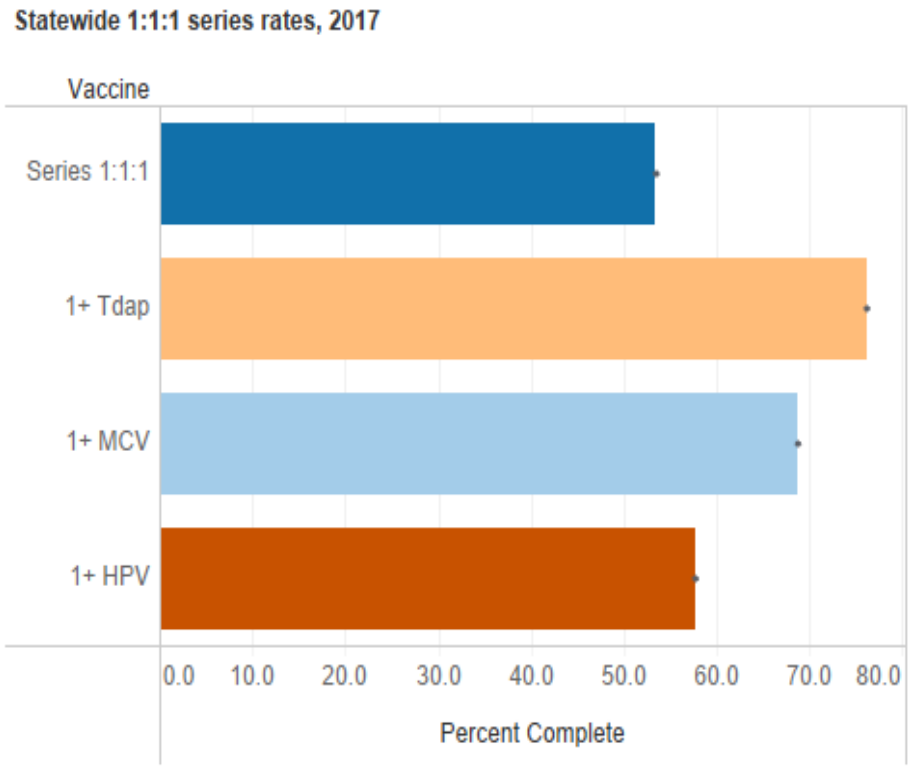
WA IIS Immunization Coverage Among 11-12 year olds, WA 2017





WA IIS Immunization Coverage Among 13-17 year olds, WA 2017





Data Resources

- NIS Childhood: https://www.cdc.gov/vaccines/imz-managers/coverage/teenvaxview/index.html
- NIS Teen: https://www.cdc.gov/vaccines/imz-managers/coverage/childvaxview/index.html
- IIS Coverage: https://www.doh.wa.gov/DataandStatisticalReports/HealthDataVisualization/ImmunizationDataDashboards

Immunization Strategies

- **Strategies**
  - Increase access to vaccines
  - Change immunization policies
  - Support evidenced based work
    - Community Interventions
    - Strong Provider Recommendation
  - Address missed opportunities
  - Use reminders / recall
  - Improve and use data

Improve data: Decrease out-of-compliance

IIS School Module used by:

- 27 public school districts (200 public schools)
- 5 private schools
- 3 charter schools

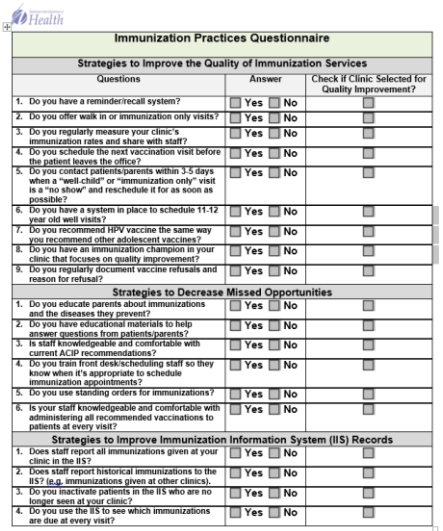
- About 97,000 (10%) of WA students currently managed in the School Module
- 53 school districts or private schools in the process of onboarding

Assessment, Feedback, Incentives, and eXchange (AFIX)

- AFIX is a quality improvement process.
- AFIX can help a clinic improve:
  - Immunization coverage rates
  - Immunization workflow and services
  - Immunization knowledge
- AFIX provides:
  - Tools to increase immunization coverage rates
  - Evidence-based practices to improve immunization rates
  - Resources on how to run immunization coverage rate reports

Strategies to increase rates

- Improve Quality of Immunization Services
  - Reminder/recall systems
  - Strong Provider Recommendation
  - Walk-in services or extended office hours
  - Assess rates & share with staff
- Decrease Missed Opportunities
  - Standing orders
  - Immunization education of staff and parents
- Improve Immunization Information System Records
  - Use EMR or IIS to identify doses due at each visit
  - Inactivate patients no longer at clinic
  - Document historical doses



Immunization Practices Questionnaire

Strategies to Improve the Quality of Immunization Services		
Questions	Answer	Check if Clinic Selected for Quality Improvement?
1. Do you have a reminder/recall system?	☐ Yes ☐ No	☐
2. Do you offer walk in or immunization only visits?	☐ Yes ☐ No	☐
3. Do you regularly measure your clinic's immunization rates and share with staff?	☐ Yes ☐ No	☐
4. Do you schedule the next vaccination visit before the patient leaves the office?	☐ Yes ☐ No	☐
5. Do you contact patients/parents within 3-5 days when a "well child" or "immunization only" visit is a "no show" and reschedule it for as soon as possible?	☐ Yes ☐ No	☐
6. Do you have a system in place to schedule 11-12 year old well visits?	☐ Yes ☐ No	☐
7. Do you recommend HPV vaccine the same way you recommend other adolescent vaccines?	☐ Yes ☐ No	☐
8. Do you have an immunization champion in your clinic that focuses on quality improvement?	☐ Yes ☐ No	☐
9. Do you regularly document vaccine refusals and reason for refusal?	☐ Yes ☐ No	☐
Strategies to Decrease Missed Opportunities		
1. Do you educate parents about immunizations and the diseases they prevent?	☐ Yes ☐ No	☐
2. Do you have educational materials to help answer questions from patients/parents?	☐ Yes ☐ No	☐
3. Is staff knowledgeable and comfortable with current ACIP recommendations?	☐ Yes ☐ No	☐
4. Do you train front desk/scheduling staff so they know when it's appropriate to schedule immunization appointments?	☐ Yes ☐ No	☐
5. Do you use standing orders for immunizations?	☐ Yes ☐ No	☐
6. Is your staff knowledgeable and comfortable with administering all recommended vaccinations to patients at every visit?	☐ Yes ☐ No	☐
Strategies to Improve Immunization Information System (IIS) Records		
1. Does staff report all immunizations given at your clinic in the IIS?	☐ Yes ☐ No	☐
2. Does staff report historical immunizations to the IIS? (e.g. immunizations given at other clinics).	☐ Yes ☐ No	☐
3. Do you inactivate patients in the IIS who are no longer seen at your clinic?	☐ Yes ☐ No	☐
4. Do you use the IIS to see which immunizations are due at every visit?	☐ Yes ☐ No	☐

Discussion

FUTURE STRATEGIES IDEAS OR NEEDS AROUND INCREASING IMMUNIZATION RATES

Washington State Department of Health is committed to providing customers with forms and publications in appropriate alternate formats. Requests can be made by calling 800-525-0127 or by email at civil.rights@doh.wa.gov. TTY users dial 711.