Increasing HPV Vaccination Rates in Alabama

Satellite Conference and Live Webcast
Friday, April 6, 2018
10:00 – 11:00 a.m. Central Time

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Video Communications and Distance Learning Division

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Estimated Vaccination Coverage among Adolescents Aged 13-17 Years, NIS-Teen, United States, 2006-2016

Estimated vaccination coverage among adolescents 13-17 years of age
National Immunization Survey-Teen, United States and Alabama, 2016

<table>
<thead>
<tr>
<th></th>
<th>United States</th>
<th>Alabama</th>
</tr>
</thead>
<tbody>
<tr>
<td>Females</td>
<td></td>
<td></td>
</tr>
<tr>
<td>21 HPV</td>
<td>65.1% (63.3-66.8%)</td>
<td>54.2% (46.1-63.1%)</td>
</tr>
<tr>
<td>HPV UTD</td>
<td>49.5% (47.6-51.4%)</td>
<td>46.5% (37.4-53.7%)</td>
</tr>
<tr>
<td>Males</td>
<td></td>
<td></td>
</tr>
<tr>
<td>21 HPV</td>
<td>56.0% (54.3-57.7%)</td>
<td>49.2% (40.5-58.1%)</td>
</tr>
<tr>
<td>HPV UTD</td>
<td>37.5% (35.8-39.2%)</td>
<td>24.7% (17.9-32.9%)</td>
</tr>
<tr>
<td>All adolescents</td>
<td></td>
<td></td>
</tr>
<tr>
<td>21 HPV</td>
<td>66.4% (59.2-61.8%)</td>
<td>51.7% (45.3-58.8%)</td>
</tr>
<tr>
<td>HPV UTD</td>
<td>43.4% (42.1-44.7%)</td>
<td>35.4% (29.5-41.7%)</td>
</tr>
</tbody>
</table>

UTD: up to date. HPV UTD includes those with ≥3 doses, and those with ≥2 doses when the first HPV vaccine dose was initiated before age 15 years and time between the first and second dose was at least 5 months minus 4 days.
Parents
- Parents are not offered vaccination
- Parents perceive vaccine as optional or unnecessary at that time
- Parents perceive that their providers discouraged vaccination
- Parents want information about vaccine safety
- Parents do not understand the reason to vaccinate at 11 to 12 years of age

Both providers and parents know they are often unaware of the timing of sexual debut.

Physicians’ Perceptions of Adolescent Vaccine
Endorsement for Patients Ages 11-12, 2014

Proportion endorsing highly (physicians) and physicians’ estimate of parents

<table>
<thead>
<tr>
<th>Vaccine</th>
<th>Physicians themselves</th>
<th>Parents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tdap</td>
<td>9.4</td>
<td>9.2</td>
</tr>
<tr>
<td>Meningococcal</td>
<td>9.1</td>
<td>9.2</td>
</tr>
<tr>
<td>HPV</td>
<td>7.0</td>
<td>7.3</td>
</tr>
</tbody>
</table>

Physicians RB et al. Pediatrics 2014;134:e666-e674

Reasons for Not Vaccinating Adolescents with HPV Vaccine, Unvaccinated Adolescents* Aged 13-17 Years, NIS-Teen, United States, 2015

<table>
<thead>
<tr>
<th>Reason</th>
<th>Parents of Girls % (95% CI)</th>
<th>Parents of Boys % (95% CI)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Not needed/necessary</td>
<td>9.6 (11.3-8.3)</td>
<td>10.6 (12.4-8.3)</td>
</tr>
<tr>
<td>Not sexually active</td>
<td>11.9 (10.7-13.1)</td>
<td>12.7 (14.3-10.3)</td>
</tr>
<tr>
<td>Safety concerns/side effects</td>
<td>13.4 (11.3-15.5)</td>
<td>12.9 (11.2-15.0)</td>
</tr>
<tr>
<td>Lack of knowledge</td>
<td>11.7 (9.2-14.8)</td>
<td>9.3 (7.7-11.1)</td>
</tr>
<tr>
<td>Not recommended</td>
<td>9.5 (7.7-11.6)</td>
<td>8.1 (7.0-9.9)</td>
</tr>
</tbody>
</table>

* Analysis limited to adolescents with one HPV vaccine dose, whose parents reported that they were not likely to seek HPV vaccination for their adolescent in the next 12 months

Why don’t adolescents finish the HPV vaccine series?

Reasons given by parents for incomplete vaccination (%)

- Provider expected
- Provider denied
- Vaccine too late
- Vaccine too early
- Vaccine not needed
- Vaccine too expensive
- Vaccine not available
- Vaccine not wanted
- Vaccine too long

Provider expectations for vaccine completion (%)

- Provider denied
- Provider expected
- Provider undecided

Perkins RB et al. Human Vaccine and Immunotherapeutics, 2016

Timeline of ACIP’s Recommendations for HPV Vaccination

- June 2006: ACIP recommended HPV4 as a 3 dose series for females at age 11-12 years, with catch up for those 13-26 years who were not previously vaccinated. HPV4 can be given as young as age 9 years.
- October 2009: ACIP updated recommendations to include HPV2 for use in females and provided guidance that HPV4 could be used in males
- October 2011: ACIP recommended HPV4 as a 3 dose series for males at age 11-12 years, with catch up for those 13-21 years who were not previously vaccinated. HPV4 can be given to males 9-26 years of age.

Estimated Vaccination Coverage with ≥1 HPV, Adolescents Aged 13-17 Years, NIS-Teen, U.S., 2016

Coverage ranged from 43.4% (Wyoming) to 88.9% (Rhode Island)

For more information, contact CDC
1-800-CDC-INFO (232-4636)
TTY: 1-888-232-6348
www.cdc.gov

The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention

Timeline of ACIP’s Recommendations for HPV Vaccination

- February 2015: ACIP updated recommendations to include HPV9 as a 3 dose series for use in both males and females.
- October 2016: ACIP recommended 2 doses of HPV vaccine, at least 6 months apart, for adolescents beginning the vaccine series before their 15th birthday and are immunocompetent, and 3-doses of HPV vaccine for persons 15-26 years of age or persons who are immunocompromised.

Average Annual Increase in Coverage with ≥1 HPV, Adolescents Aged 13-17 Years, NIS-Teen, United States, 2013-2016

National Average Annual Increase = 5.0 percentage points
The greatest statistically significant average annual increase were in New York City (7.7 percentage points), Nevada (7.6), Maryland (7.4), New York (7.2), and Alaska (7.1)