

Standards for Adult Immunization Practice

Assessing Implementation from Provider and Patient Perspectives

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Background

- Adult immunization coverage is low
- Healthcare provider (HCP) recommendation is key predictor for adult vaccination
- Standards for adult immunization practice published to improve awareness among HCPs and uptake of ACIP-recommended vaccines for adults

Adult Vaccination Coverage 2015

- Brief update published online Feb 7 (full article pending publication in MMWR)
 - Non-influenza vaccination coverage National Health Interview Survey (NHIS)
 - Influenza vaccination coverage Behavioral Risk Factor Surveillance System (BRFSS)
- Key findings
 - Pneumococcal vaccination for 19–64y high risk: 23.0% (↑2.8%)
 - Tdap vaccination for \geq 19y: 23.1% (\uparrow 3.1%); adults living with infants <1y: 41.9% (\uparrow 10.0%)
 - Shingles vaccination for ≥60y: 30.6% (↑2.7%)
 - Otherwise similar to 2014 estimates; in 2015:
 - Influenza vaccination 2015–2016 for ≥18y: 41.7%
 - Pneumococcal vaccination for ≥65y: 63.6%
 - Hepatitis B vaccination for 19–59y w diabetes: 24.4%
 - Racial and ethnic disparities persisted lower coverage among blacks and Hispanics

Standards for Adult Immunization Practice

- Developed in 1990 to improve vaccine delivery to adults, updated in 2014 by National Vaccine Advisory Committee
- All HCPs, including those who do not provide vaccine services, have role in ensuring patients up-to-date on vaccines
- Call to action for HCPs for adults to
 - ASSESS vaccination status of all patients at every clinical encounter
 - Strongly RECOMMEND vaccines that patients need
 - ADMINISTER needed vaccines or REFER to a vaccine service provider
 - DOCUMENT vaccines received by patients in state vaccine registries
- Promoted through National Adult and Influenza Immunization Summit (NAIIS)

Surveys for Implementation of the Standards

- Evaluate implementation of the standards through surveys
- General adult population Received care that reflects the standards at last visit to HCP or pharmacy in past 12 months?
- HCPs (including pharmacists) Implemented the standards during patient visits?

Methods

General Adult Population

- Internet panel of adults (age ≥19 years)
 in general population (KnowledgePanel)
 - Visits to HCP or pharmacy
 - Opt-in
 - Weighted, probability-based, representative
- Outpatient settings
- Administered online Feb–Mar 2016

HCPs

- Internet panel of physicians, nurse practitioners, physician assistants, pharmacists (Medscape)
 - Internal medicine, family medicine, ob/gyn, specialty care; pharmacists
 - Opt-in
 - Weighted, probability-based, representative
- Outpatient settings
- Administered online Feb–Mar 2016

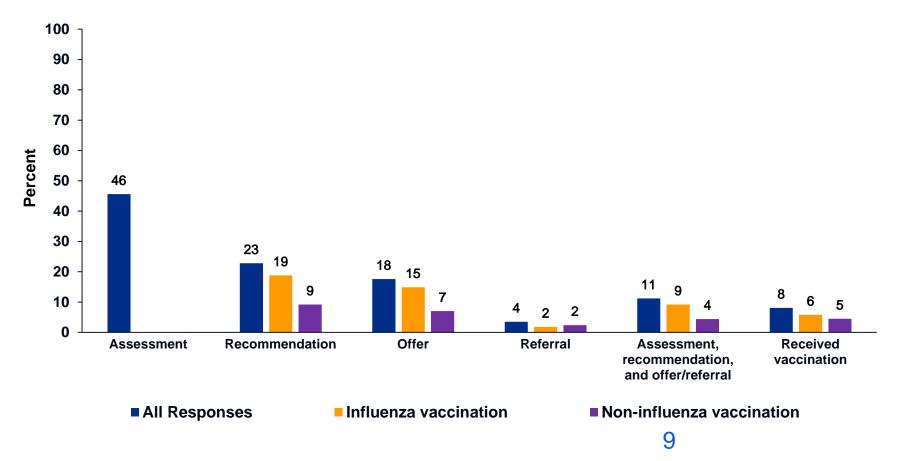
Results – General Adult Population

- 3,473 panelists invited → 2,004 (57.7%) accessed survey → 1,905 (95.1%) completed survey
- Data analyzed from 1,476 (77.5%) respondents who had outpatient visits with healthcare providers or pharmacists in past 12 months
 - 459 (68.3%) self-reported non-Hispanic white
 - 50% female
 - Median age 55y (range 19–92y)
 - 1,399 (94.7%) insured
 - 1,203 (59.7%) had at least a college education

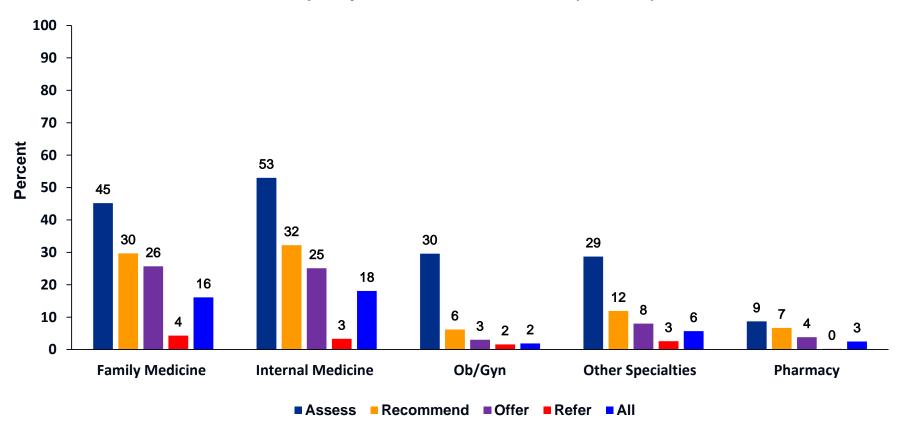
Results - Healthcare Providers and Pharmacists

- HCPs: 74,067 email invitations \rightarrow 1,907 started survey \rightarrow 1,684 (88.3%) completed survey; data analysis on 1,641 eligible
 - 32.3% family medicine, 27.5% internal medicine, 21.3% ob/gyn, 18.8% other specialties
 - 45.8% private practice, 37.5% healthcare system-owned practice
 - 65.9% non-Hispanic white
- Pharmacists: 9,310 email invitations → 320 started survey → 277 (86.6%) completed survey; data analysis on 277 eligible
 - 44.2% chain drug store pharmacist, 31.9% retail or grocery store pharmacist, 17.7% independent
 - 87.2% employee, 7.2% contractor, 5.6% owner
 - 70.0% non-Hispanic white

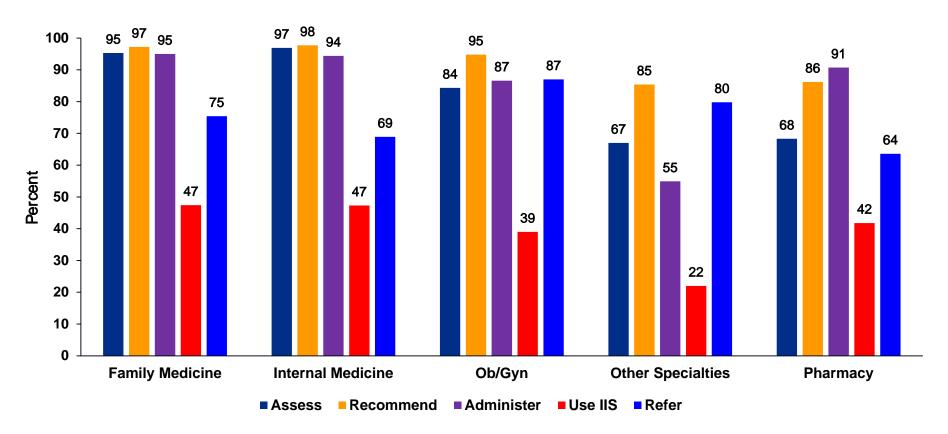
Reported receipt of care reflecting the standards among adults with healthcare or pharmacy visits in the past year, by influenza vs. non-Influenza vaccines, United States, 2016 (N=1,476)



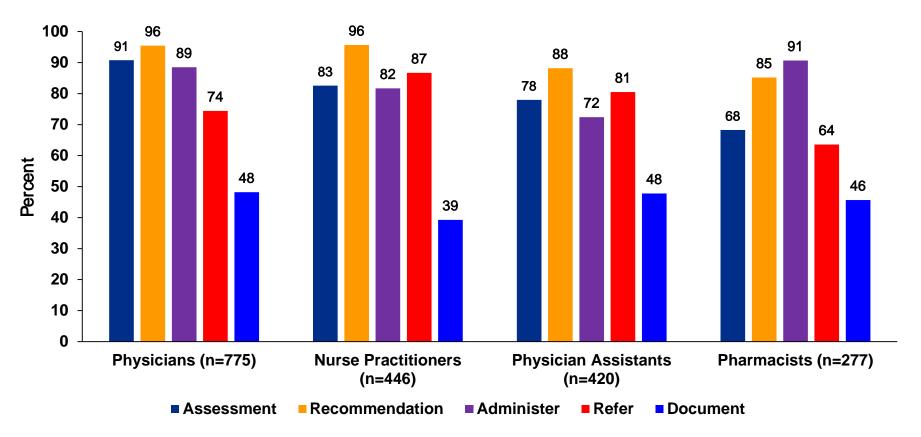
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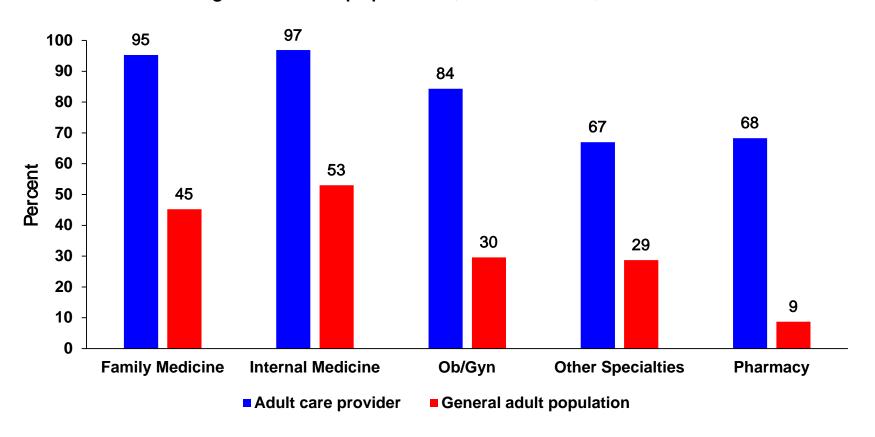
Reported implementation of standards components among HCPs and pharmacists, by provider specialty, United States, 2016 (N=1,918)



Reported implementation of standards components among HCPs and pharmacists, by provider profession, United States, 2016 (N=1,918)



Comparison of adult vaccination assessments reported by HCPs and pharmacists, and general adult population, United States, 2016



Summary

- Adult patients reported low levels of receipt of care that reflected the standards
 - Primary care visits (vaccination assessment 45–53%); lower for ob/gyn (30%),
 specialty care (29%), pharmacies (9%)
- HCPs and pharmacists reported high levels of implementation of the standards
 - Primary care highest (vaccination assessment 95–97%), followed by ob/gyn (84%),
 and specialty care (67%) and pharmacists (68%)
 - High levels of assessment, recommendation, and offer/refer; but limited use of IIS

Limitations

- Patients may not be aware of assessment done "behind the scene"
- HCPs may generalize their immunization practices to all patients
- Sampling bias self-selected internet panels of respondents, differences between respondents and non-respondents
- Recall bias
- Results based on self-report and not verified
- Survey response rate cannot be calculated because opt-in recruitment sample does not permit enumeration of the denominator

Key Messages

- The standards should be incorporated into routine clinical practice for every patient and at every visit
- HCPs and pharmacists should talk with their adult patients about vaccines
- Consistent implementation of the standards is needed to improve adult immunization coverage in United States

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