

71272GPmeeting_13: Power Point Presentation

Presented by Melissa Gilkey, PhD, Assistant Professor of Population Medicine at Harvard Medical School
and Harvard Pilgrim Health Care Institute

“Research Project Update: AFIX Program Strategies for Improving HPV Vaccination Rates in the Field”

Presentation to the Association of Immunization Managers, hosted by the Centers for Disease Control
and Prevention

May 19, 2016

(<https://cc.readytalk.com/cc/s/meetingArchive?eventId=aqwpptpdbl5b>)

Research Update: HPV Vaccine AFIX Study

Research Team

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Practice Teams

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Stephanie Sanchez, Rachel Potter (Michigan)



UNC
LINEBERGER

HPV Vaccination in the U.S.

“Increasing HPV uptake must be a national priority.”

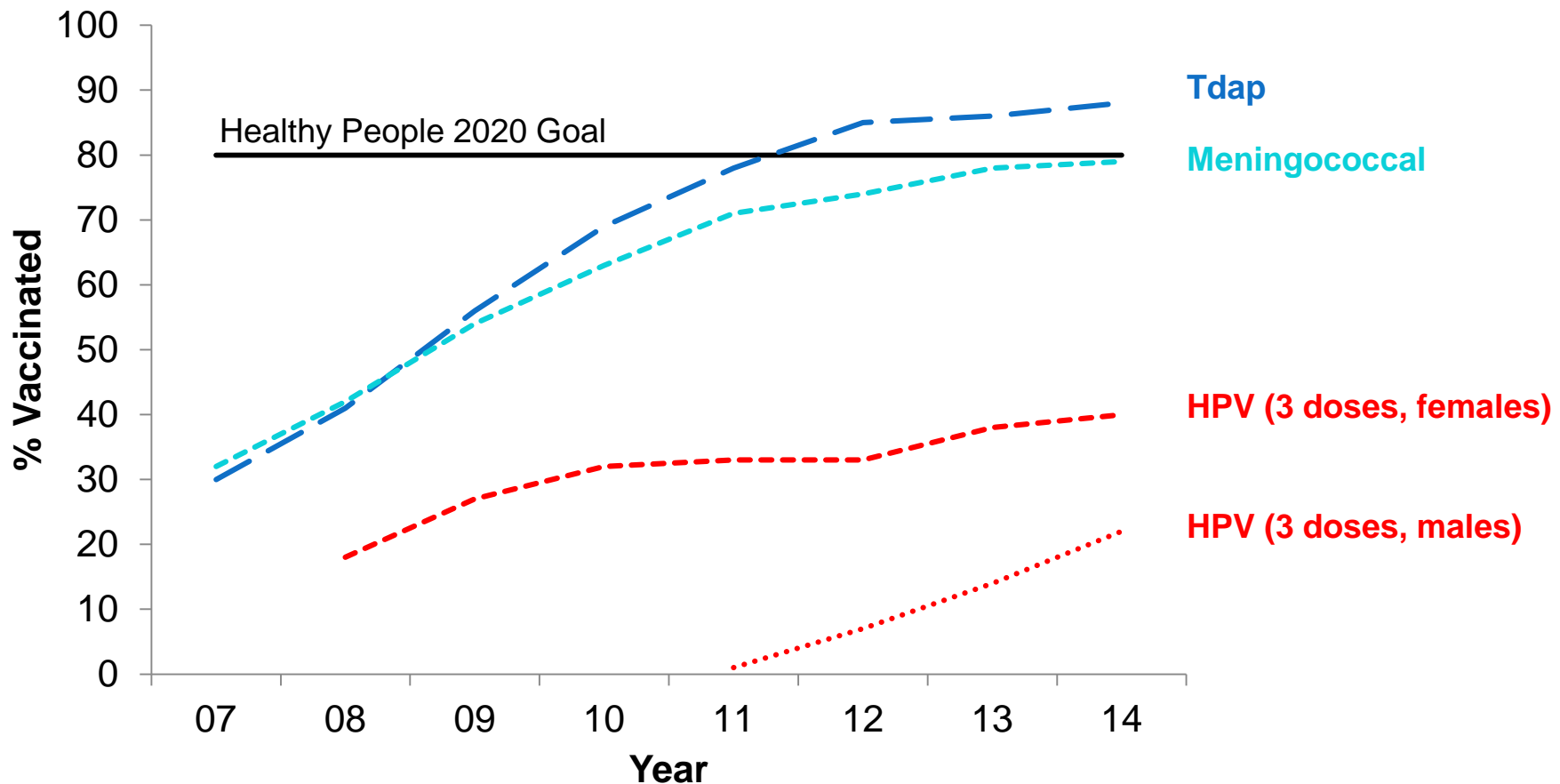
--President's Cancer Panel

HPV vaccination guidelines

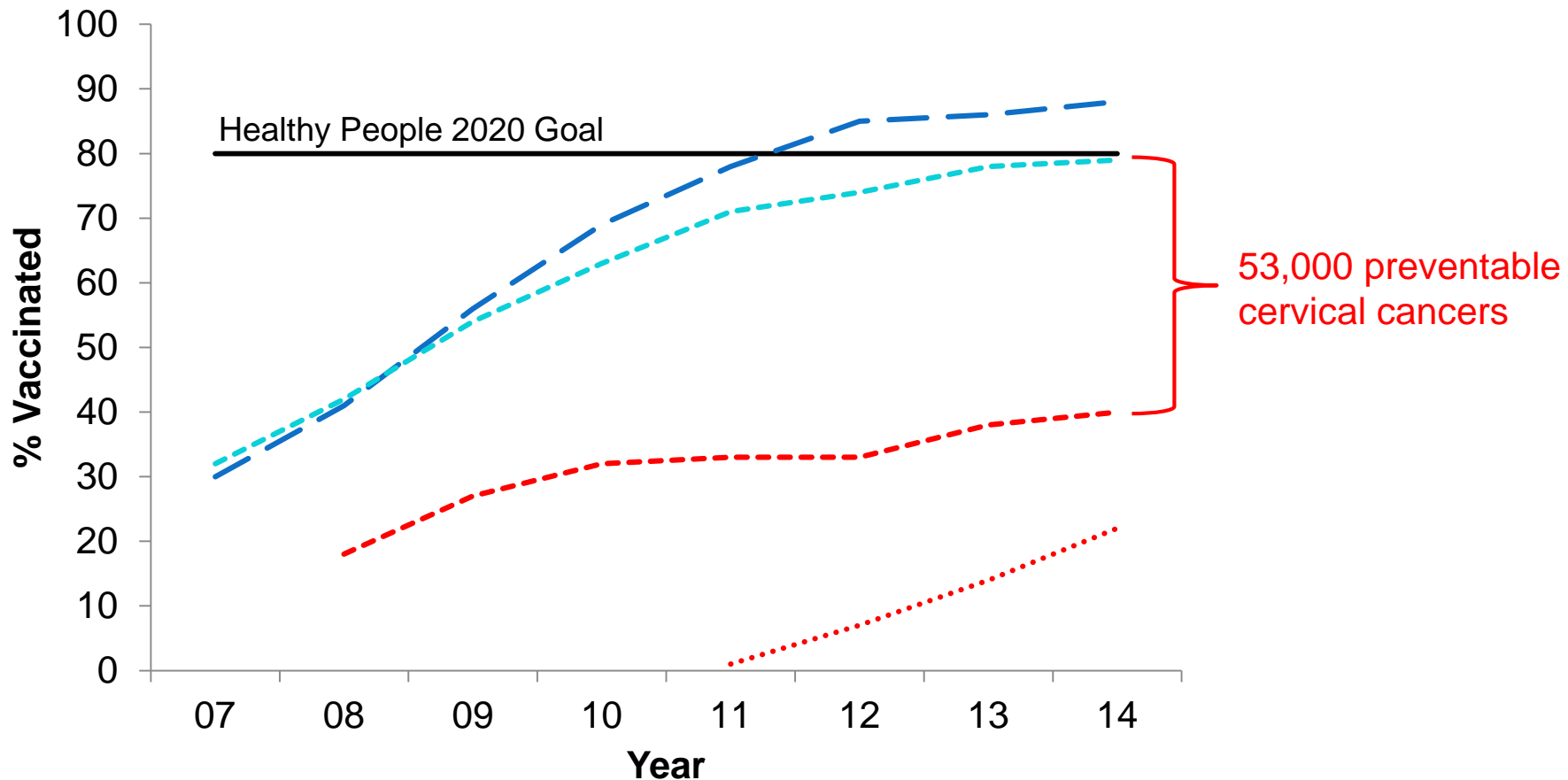
- On-time
 - Males and females, ages 11-12
- Late
 - Females and MSM to age 26
 - Other males to age 21



U.S. adolescent immunization coverage



U.S. adolescent immunization coverage

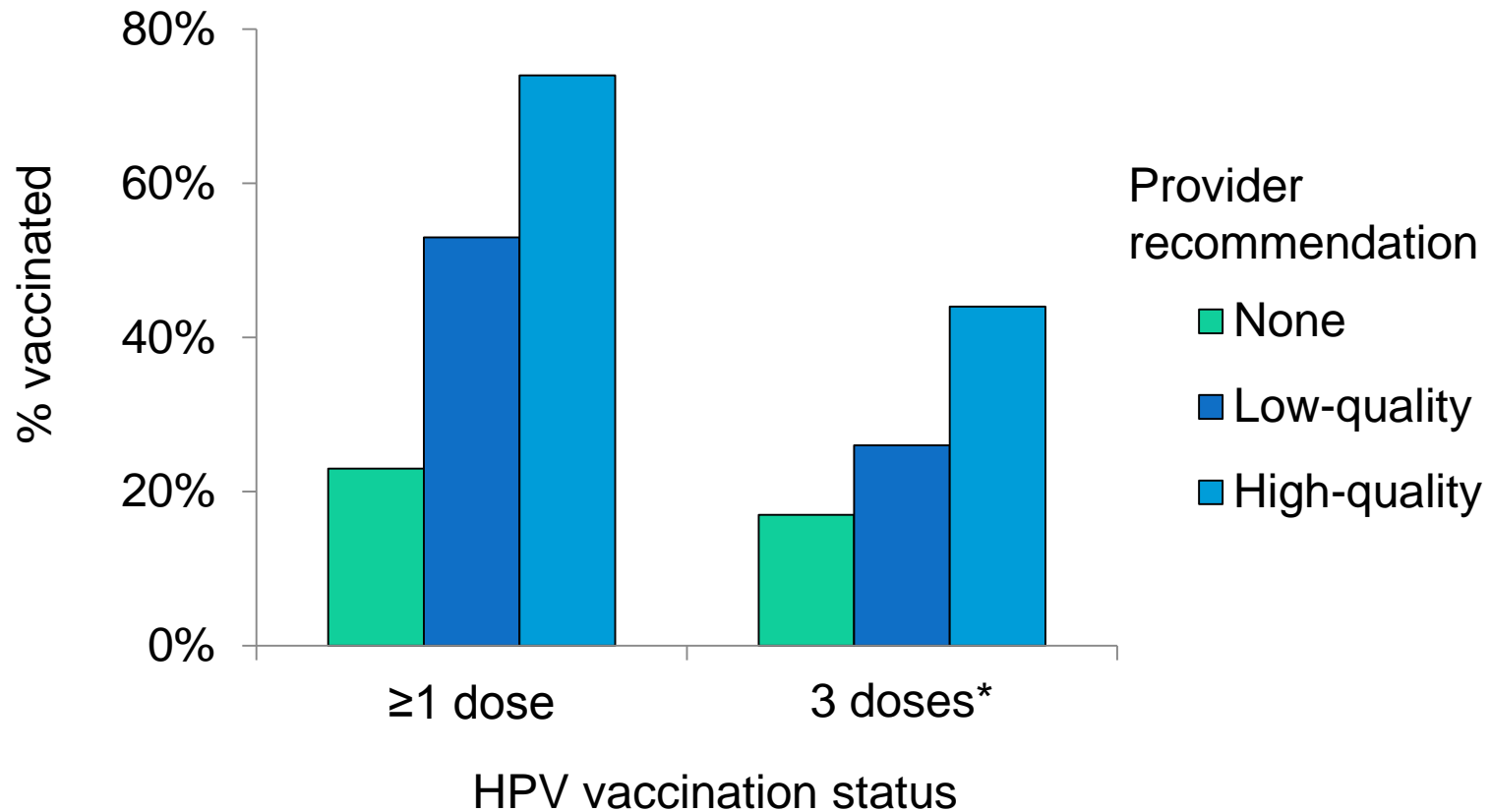


Role of parents

- Reasons for not getting HPV vaccine vary

	<u>Girls</u>	<u>Boys</u>
▫ Lack of knowledge	16%	16%
▫ Not needed	15%	18%
▫ Not recommended	13%	23%
▫ Safety/side effects	14%	7%
▫ Not sexually active	11%	8%

Role of healthcare providers



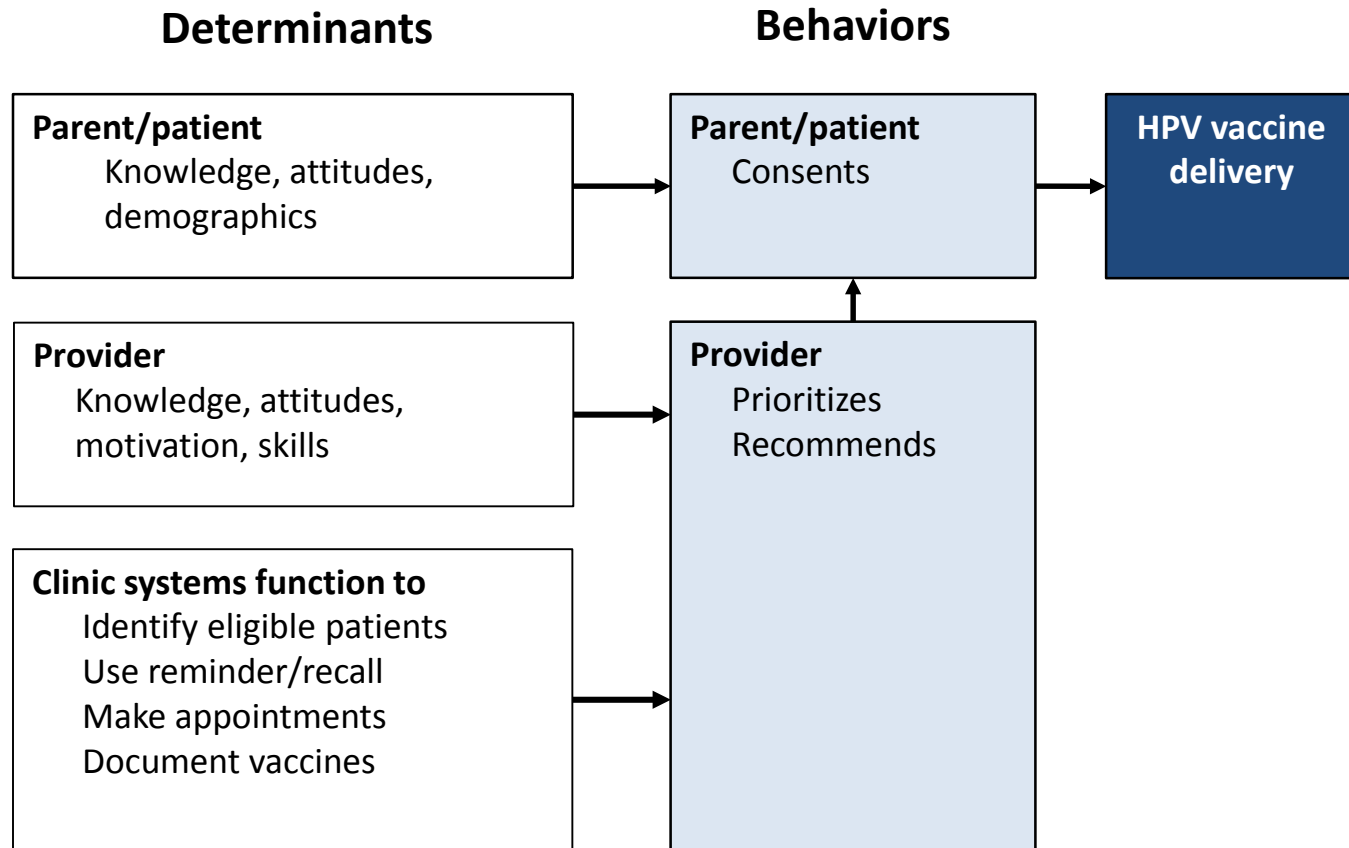
* Among those who received first dose

(Gilkey et al., *Vaccine*, 2016)

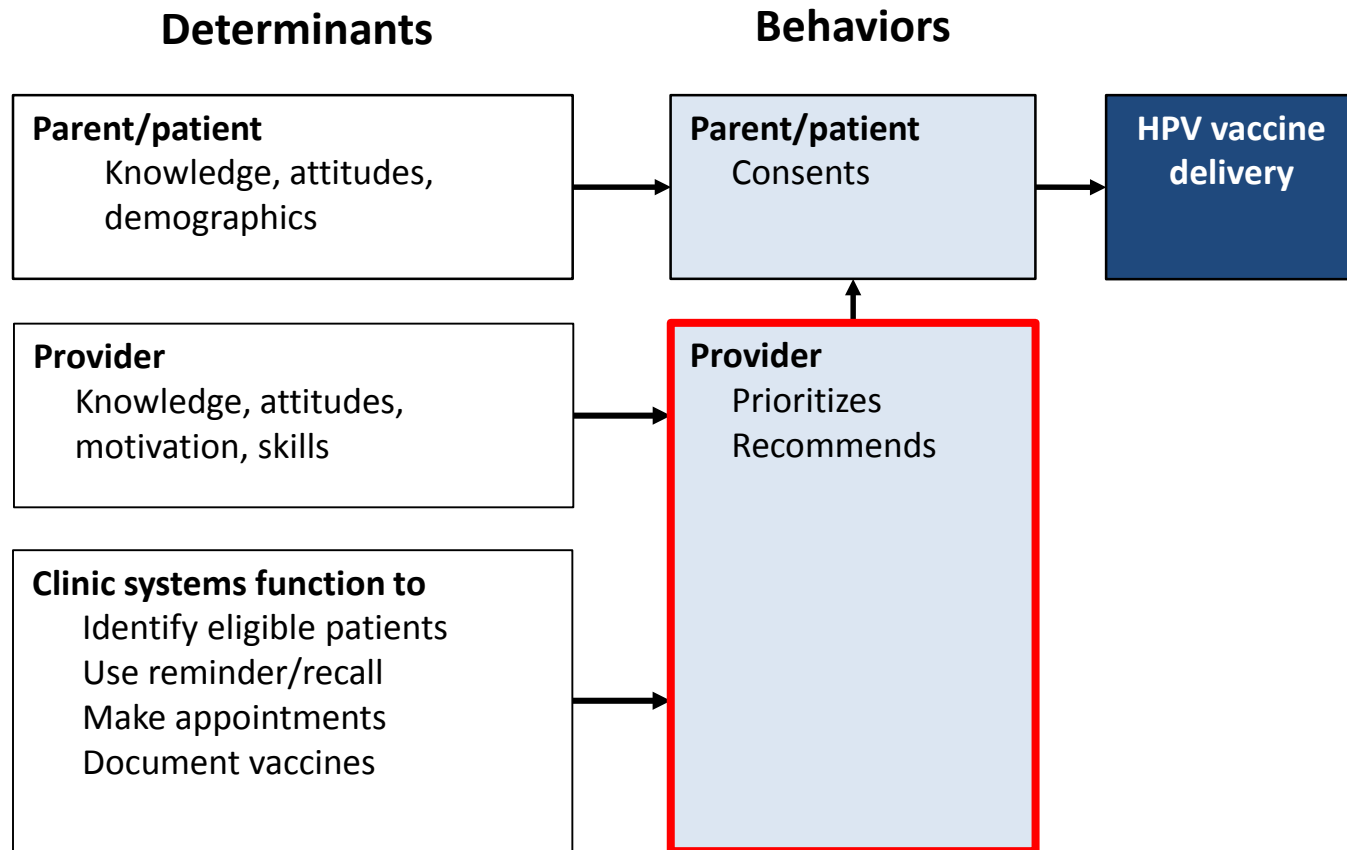
Recommendations need improvement

- No recommendation
 - 36% of girls and 58% of boys, ages 13-17, have not received a recommendation
- Weak recommendation
 - 51% of physicians report using 2 or more lower-quality HPV vaccine recommendation practices

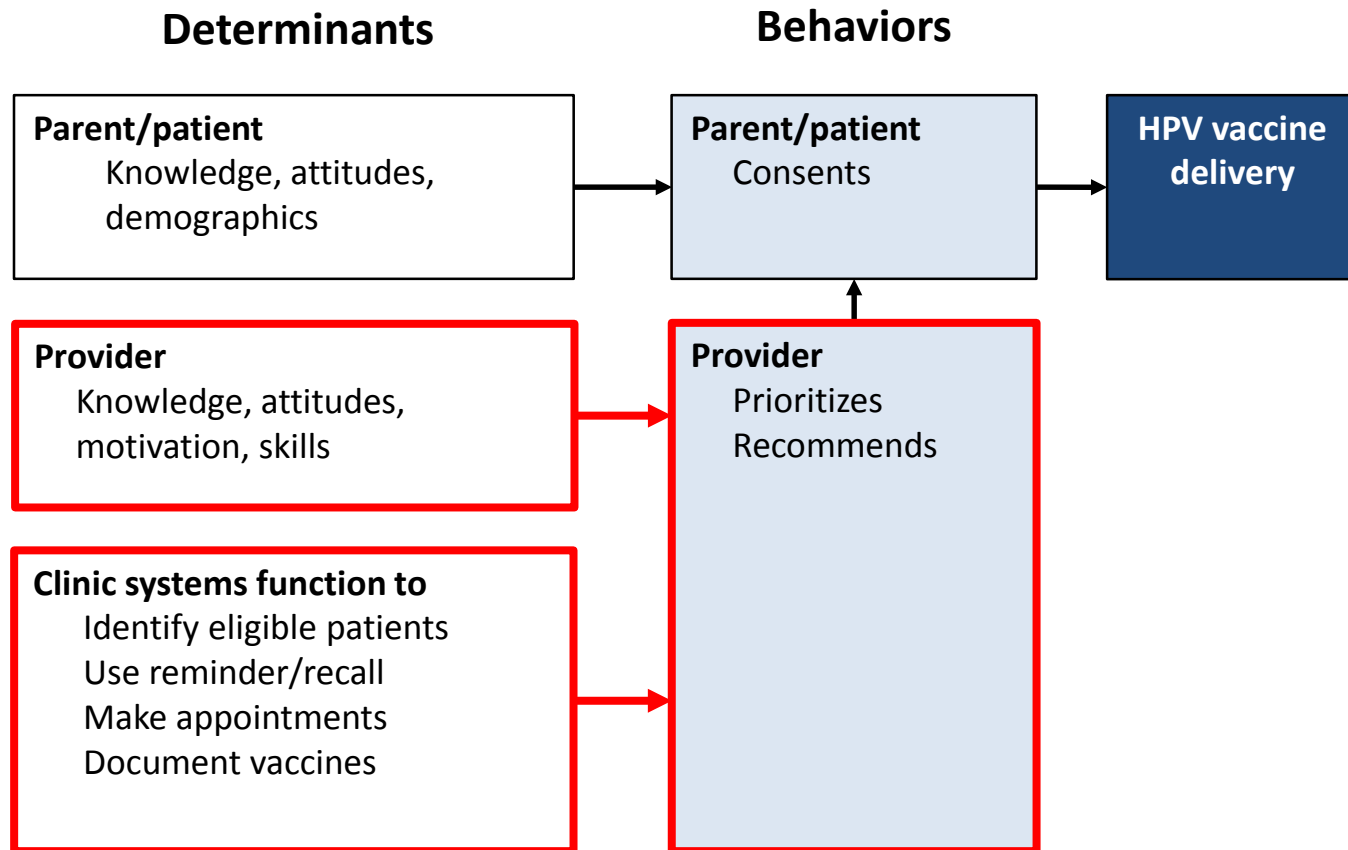
Conceptual Model of Low HPV Vaccine Uptake



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Conceptual Model of Low HPV Vaccine Uptake



AFIX

Theoretical basis and prior evaluation

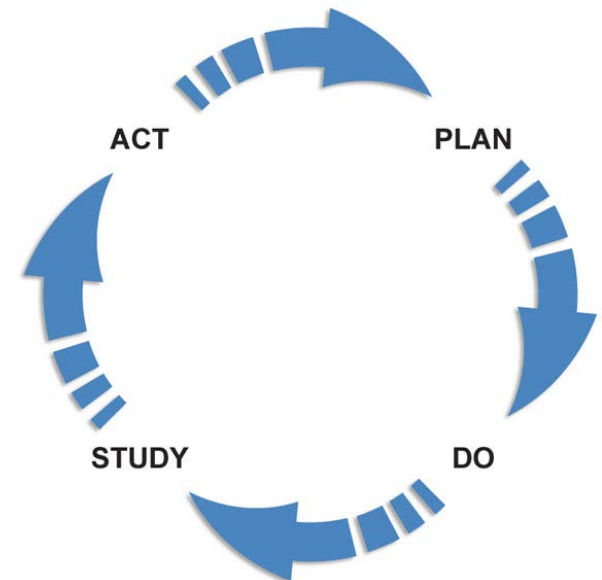


CDC's AFIX Model

- **A**ssessment of immunization coverage
- **F**eedback of the assessment results
- **I**ncentives to improve coverage levels
- **eX**change of information and resources

Continuous Quality Improvement

- Data-driven approach
- Use of short, PDCA cycles
- Spirit of experimentation, collaboration



2011 AFIX Pilot: 3-arm RCT w/ 91 clinics

In-person
visit



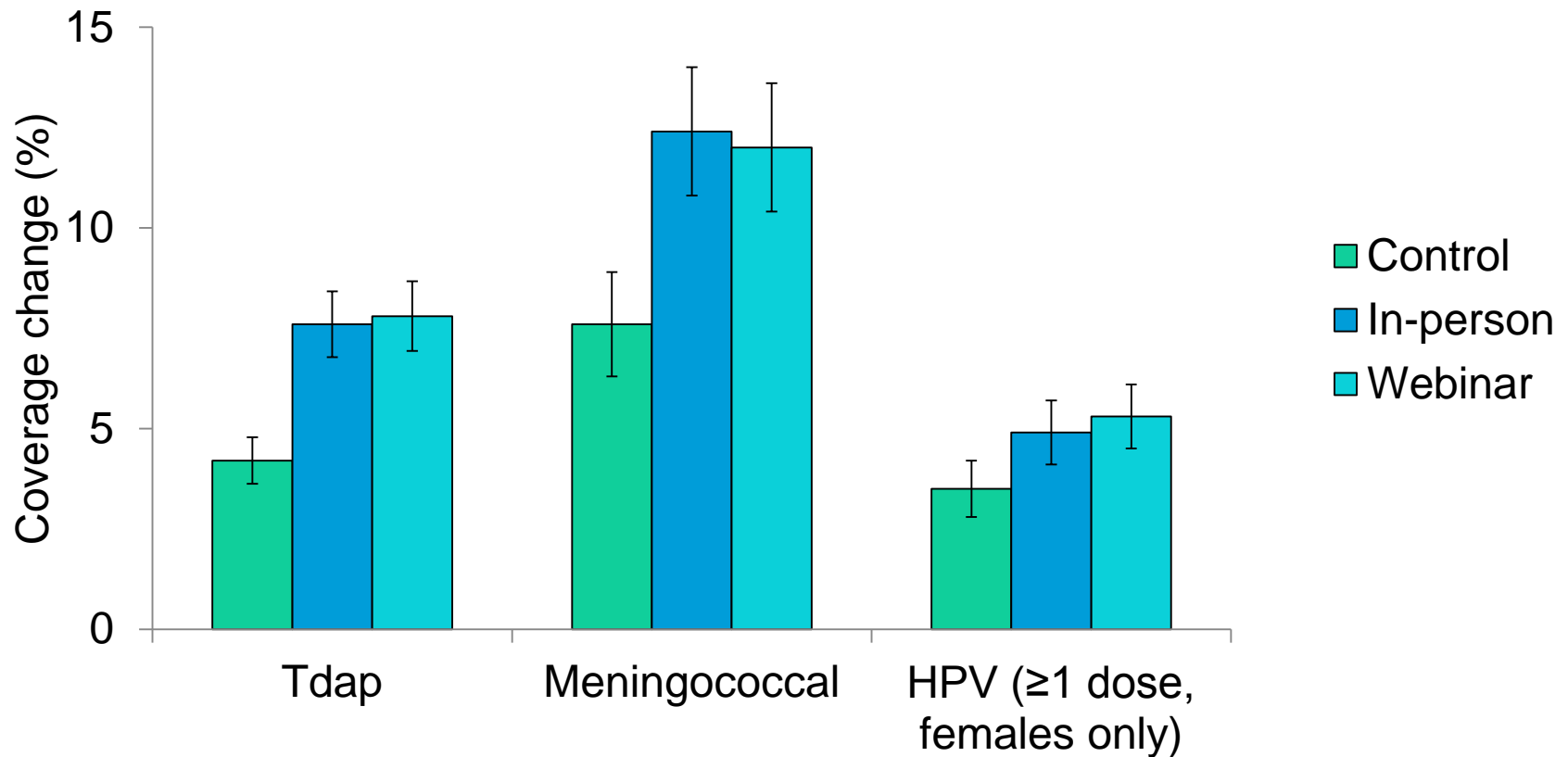
Webinar
visit



Control

No AFIX

Vaccine coverage changes at 5 months, ages 11-12



HPV Vaccine AFIX Study

Aims, intervention development, and evaluation



Study goal: Raise HPV vaccination coverage

1. Identify key challenges to HPV vaccination quality improvement in primary care clinics
2. Develop tools and strategies to address those challenges during AFIX visits
3. Assess the impact of modified AFIX visits on adolescents' HPV vaccination status



Formative research

Interviews with AFIX stakeholders

- State health department staff who deliver AFIX
- Vaccine providers who receive AFIX
- AFIX leaders at CDC

QI Challenge 1

Some providers see low HPV vaccination coverage as normal.

QI Challenge 1

Some providers see low HPV vaccination coverage as normal.




Communicate the problem, motivate QI, build skills & confidence.

Immunization report card

- Communicate the problem
- Set a goal
- Give a solution

YOUR IMMUNIZATION REPORT CARD



1 REVIEW

your clinic's adolescent vaccine coverage.

ABC Pediatrics VFC 12345678 3/20/15

Your clinic has...	HPV		Meningococcal, ≥1 dose	Tdap
	Males, ≥1 dose	Females, ≥1 dose		
567 patients, age 11-12	20 %	45 %	68 %	73 %
756 patients, age 13-17	31 %	60 %	79 %	88 %

Coverage estimates are for patients in our state's immunization registry.

2 SET A GOAL

to improve HPV vaccine coverage in the next 6 months.

HPV Goal	Progress at 3 months	Progress at 6 months
57 patients, age 11-12		
76 patients, age 13-17		

Goals represent 10% of male and female patients in your clinic with records in our state's immunization registry. A typical clinic may give the first dose of HPV vaccine to 5% of their adolescent patients in 6 months. The goal is to double this rate.

3 RECOMMEND

HPV vaccination for adolescents, starting at age 11.

Offer HPV vaccine in the same direct way you recommend other vaccines. Try saying:

"Your child needs three shots today: meningitis, HPV, and Tdap vaccines."

Your recommendation is the single biggest influence on parents' decisions to get HPV vaccine for their children. The vaccine produces a better immune response in younger adolescents. Vaccinating in the preteen years is best.

EARN FREE CMEs

on HPV vaccine communication: www.cdc.gov/vaccines/ed/hpv/

1

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Initial visit

2 SET A GOAL

to improve HPV vaccine coverage in the next 6 months.

HPV Goal	Progress at 3 months	Progress at 6 months
57 patients, age 11-12	38	
76 patients, age 13-17	46	

Goals represent 10% of male and female patients in your clinic with records in our state's immunization registry. A typical clinic may give the first dose of HPV vaccine to 5% of their adolescent patients in 6 months. The goal is to double this rate.



3 month follow up

2 SET A GOAL

to improve HPV vaccine coverage in the next 6 months.

HPV Goal	Progress at 3 months	Progress at 6 months
57 patients, age 11-12	38	60
76 patients, age 13-17	46	80

Goals represent 10% of male and female patients in your clinic with records in our state's immunization registry. A typical clinic may give the first dose of HPV vaccine to 5% of their adolescent patients in 6 months. The goal is to double this rate.



6 month follow up

YOUR IMMUNIZATION REPORT CARD



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QI Challenge 2

Incentivizing provider participation in AFIX necessary, but difficult.

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Identify low-cost incentives that are meaningful to providers.

Strategies for involving providers

- CME credit to attend AFIX visit
 - 1.0 Hour of AMA Category 1 Credit
 - Accredited by the American Academy of Family Physicians
 - One-time fee of \$600
- Didactic PPT presentation on HPV vaccine QI
- Quality improvement action plan

QI action plan

Primary strategy

- Share HPV vaccination coverage estimates
- Discuss giving strong HPV vaccination recommendations

Secondary strategy

- Review CDC guidelines
- Train front desk staff
- Encourage physicians to sign standing orders
- Give educational materials to parents

Communication plan

- Share hard copies of Report Card
- Deliver a presentation during a staff meeting
- Provide e-mail addresses to AFIX specialist

HPV Vaccination Quality Improvement ACTION PLAN

PRIMARY QI STRATEGY

Goal: Deliver strong recommendations for HPV vaccination for all patients, starting at age 11.

- Share HPV vaccine coverage estimates with all immunization staff.
- Discuss the need to improve HPV vaccine coverage through provider recommendations.

SECONDARY QI STRATEGY (choose one or more)

Goal: Reduce missed opportunities for HPV vaccination.

- Review CDC guidelines for HPV vaccination with all immunization staff, including the importance of concomitant vaccination.
- Train front desk staff on how to schedule appointments to support HPV vaccination.
- Sign standing orders for HPV vaccination.
- Provide informational materials on HPV vaccination to support parent and patient decision-making.
- Other _____

COMMUNICATION PLAN

- Share hard copies of Immunization Report Card.
- Deliver a brief presentation about this QI project during a regular staff meeting.
- Provide e-mail addresses of vaccine providers and office staff to receive periodic program updates.
- Other _____

QI Challenge 3

Competing demands can overshadow AFIX.

QI Challenge 3

Competing demands can overshadow AFIX.



Create opportunities to keep in touch with providers and maintain their focus.

Strategies for maintaining focus

- Interim progress report
- Email coaching
 - Educational resources
 - Immunization report cards at 0-, 3-, and 6-months

Putting it all together

Schedule clinics

- CMEs to incentivize provider participation

Deliver AFIX visits

- Report card to communicate problem, set QI goal
- PPT slides to improve knowledge, skills
- Action plan to facilitate communication within clinic

Conduct follow-up

- Interim progress reports to inform further QI effort
- Email coaching to maintain providers' focus

Assessing impact

Ongoing randomized controlled trial



Study team



3-arm RCT with 250 primary care clinics

In-person
visit



Webinar
visit



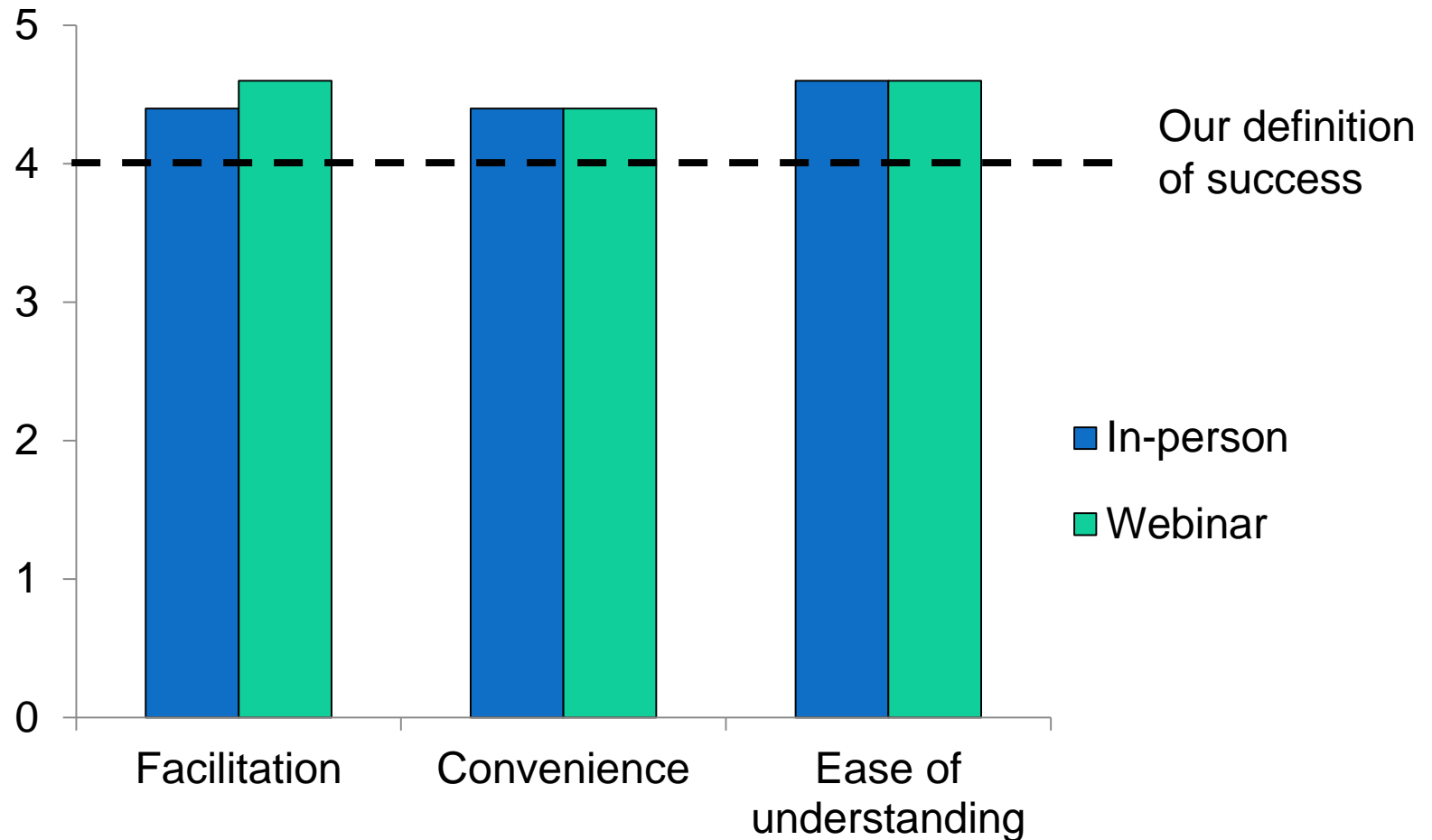
Control

No AFIX

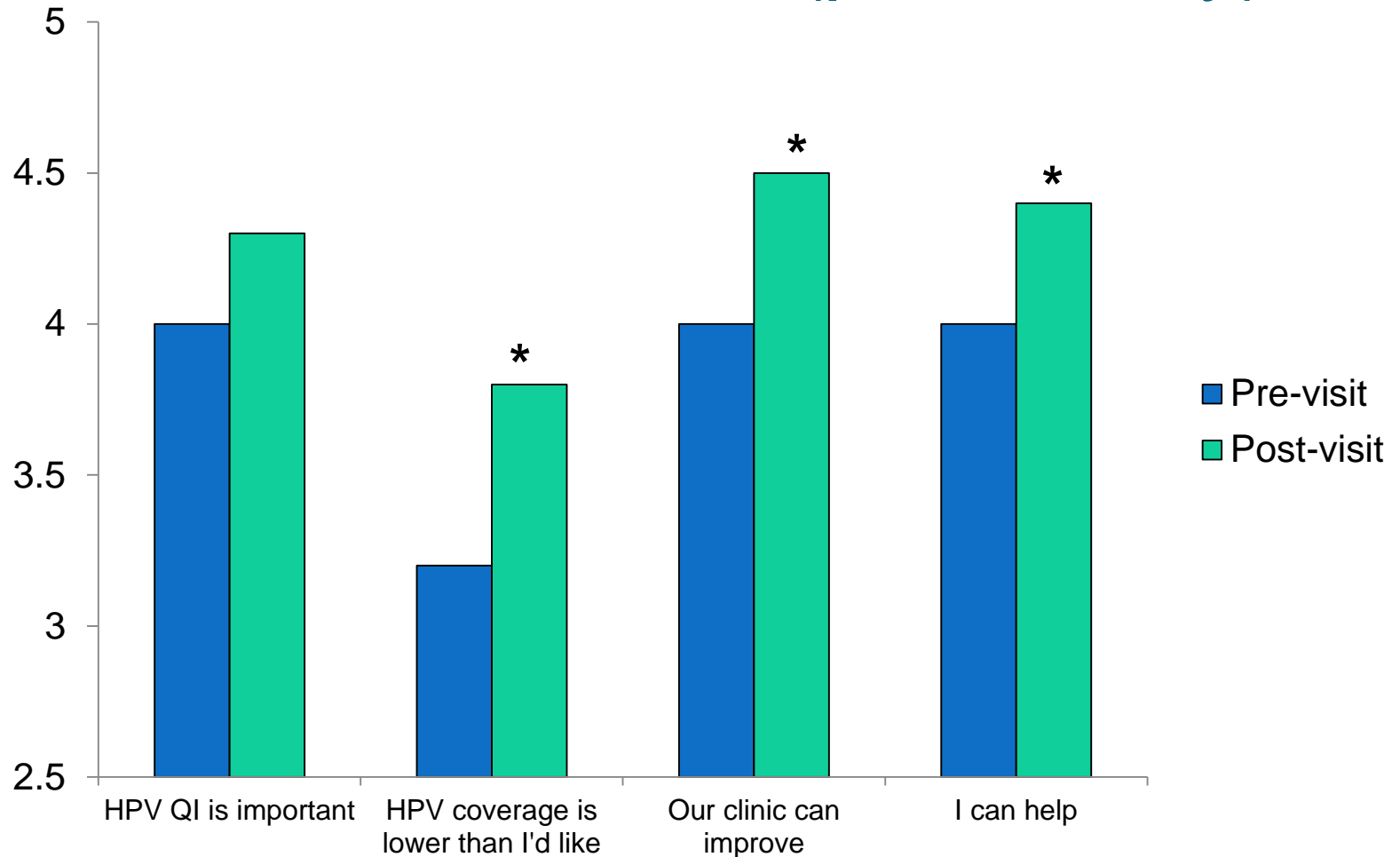
Assessments

Evaluation component	Data source
1. Vaccination coverage at 0-, 3-, 6-, 9-, 12-months A. HPV vaccine (≥ 1 dose) B. Other adolescent vaccines	State immunization registries
2. Fidelity	Observation of AFIX visits
3. Participant satisfaction, self-efficacy, engagement	Online surveys of healthcare providers
4. Delivery cost	State partner time logs and invoices
5. State partner feedback	Weekly TA calls

Satisfaction ratings (preliminary)



Intermediate outcomes (preliminary)



Stay tuned for data on...

Outcomes

- Impact of AFIX consultations on HPV vaccination coverage

Delivery mode

- Comparison of webinar versus in-person delivery on cost, satisfaction, and effectiveness

Research team conclusions

- AFIX is an opportunity
- Creative solutions to QI challenges are needed
 - Communicating the problem of low coverage
 - Incentivizing and maintaining provider participation
 - Setting measurable goals

Thank you

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