

A Needs Assessment Questionnaire of the Use of Pneumococcal Vaccines in Adults Older Than 65 Years

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Background

In 2019, the US Centers for Disease Control Advisory Committee on Immunization Practices (ACIP) recommended that the use of pneumococcal **conjugate vaccine 13 valent (PCV13)** be based:

“on shared clinical decision-making for adults 65 years or older who do not have an immunocompromising condition, cerebrospinal fluid leak, or cochlear implant and have never received a dose of PCV13.”¹

Shared decision making (SDM) is important to the delivery of high-quality, patient-centered, personalized care.²⁻⁵

SDM has been recommended for decisions related to a variety of clinical preventive services, but few recommendations for SDM for vaccines exist.⁶



Objective

To gather feedback from clinicians to develop resources to facilitate SDM for the use of PCV13 in adults 65 years or older.

Methods: Questionnaire

- We developed an online questionnaire based on a knowledge, attitudes, and behaviors model
- The 20-questions included:
 - Demographic information
 - Knowledge of and attitudes towards use of pneumococcal vaccines and SDM
 - Behaviors regarding use of pneumococcal vaccines, SDM, and telemedicine
 - Changes in behaviors since the pandemic
- Respondents could provide contact information if they wished to participate in the quality improvement (QI) project

Setting and Participants

Beginning in April 2021, our questionnaire was disseminated through:

- The Wisconsin Research and Education Network (WREN) newsletter, which reaches >1,000 constituents
- E-mails to UW Health clinicians in the Department of Family Medicine and Community Health at the University of Wisconsin Madison
- The Pharmacy Practice Enhancement and Action Research Link (PearlRx) of Wisconsin, which has 628 pharmacist members
- Personalized email outreach to connections across Wisconsin (P. Hunter)
- After the ACIP proposed new recommendations for pneumococcal vaccines in October 2021, we completed additional outreach to UW Health clinicians in General Internal Medicine using a modified questionnaire.

Abbreviations for Vaccines

- PCV13: Pneumococcal conjugate vaccine 13 valent (Pneumovax®)
- PCV20: Pneumococcal 20-valent conjugate vaccine (Pneumovax 20®)
- PCV15: Pneumococcal 15-valent conjugate vaccine (Vaxneuvax™)
- PPSV23: 23-valent, Pneumococcal polysaccharide vaccine (Pneumovax®23)

Acknowledgments

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Poster Link



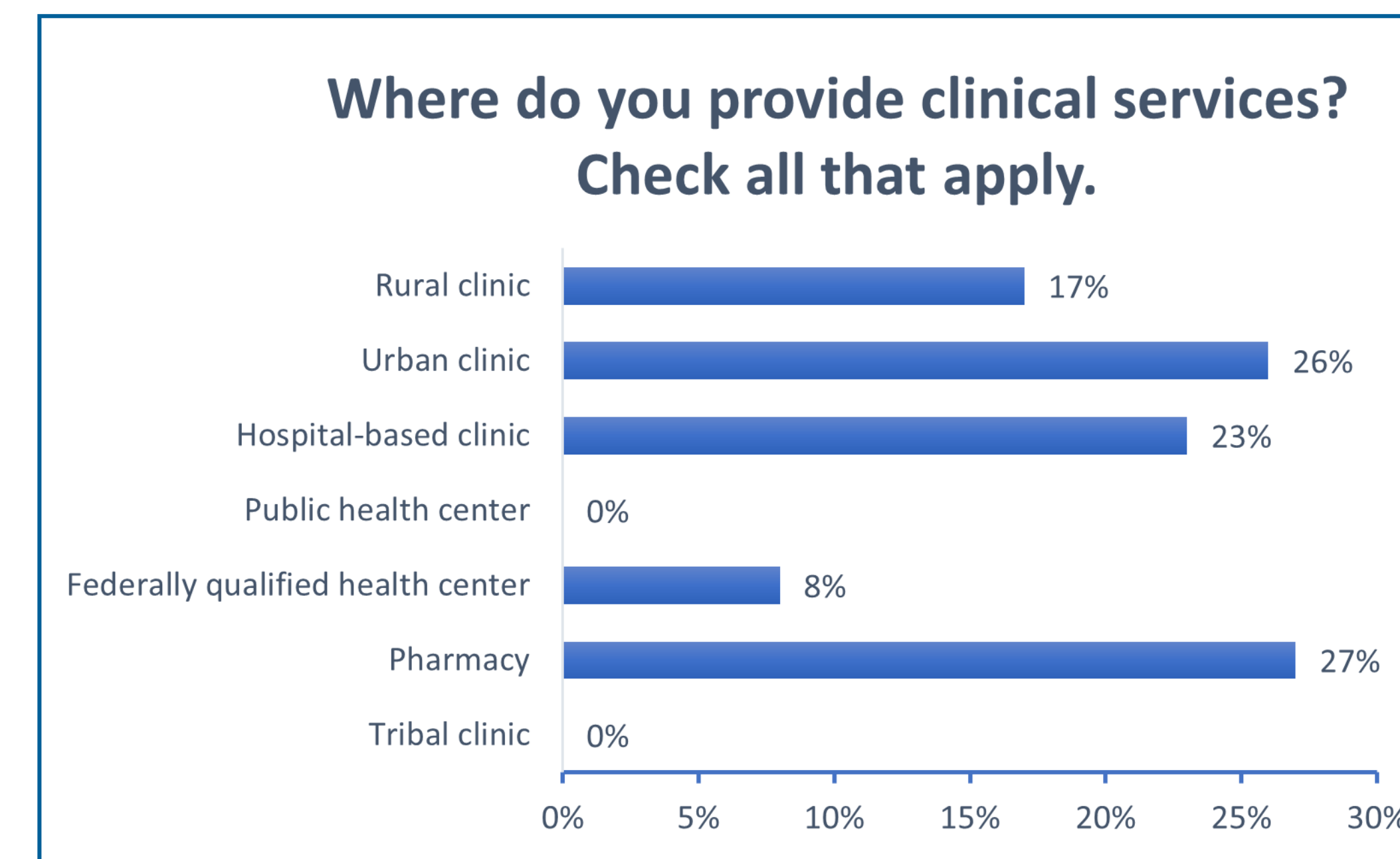
Demographics

75 respondents

- 48% Pharmacists
- 40% Physicians
- 8% Physician assistants or nurse practitioners

Years in clinical practice

- 57% More than 10 years
- 15% 6-10 years
- 24% 0-5 years
- 3% Resident or other training



Knowledge

The questionnaire revealed knowledge gaps that can be addressed in the planned educational materials.

Attitudes

71% thought it was worthwhile to give the PCV13 vaccination to their patients ≥65 years old

Behaviors

About **1/3 of physicians** counseled patients 65 years and older on the potential harms and benefits of vaccines more than **8 times** per week

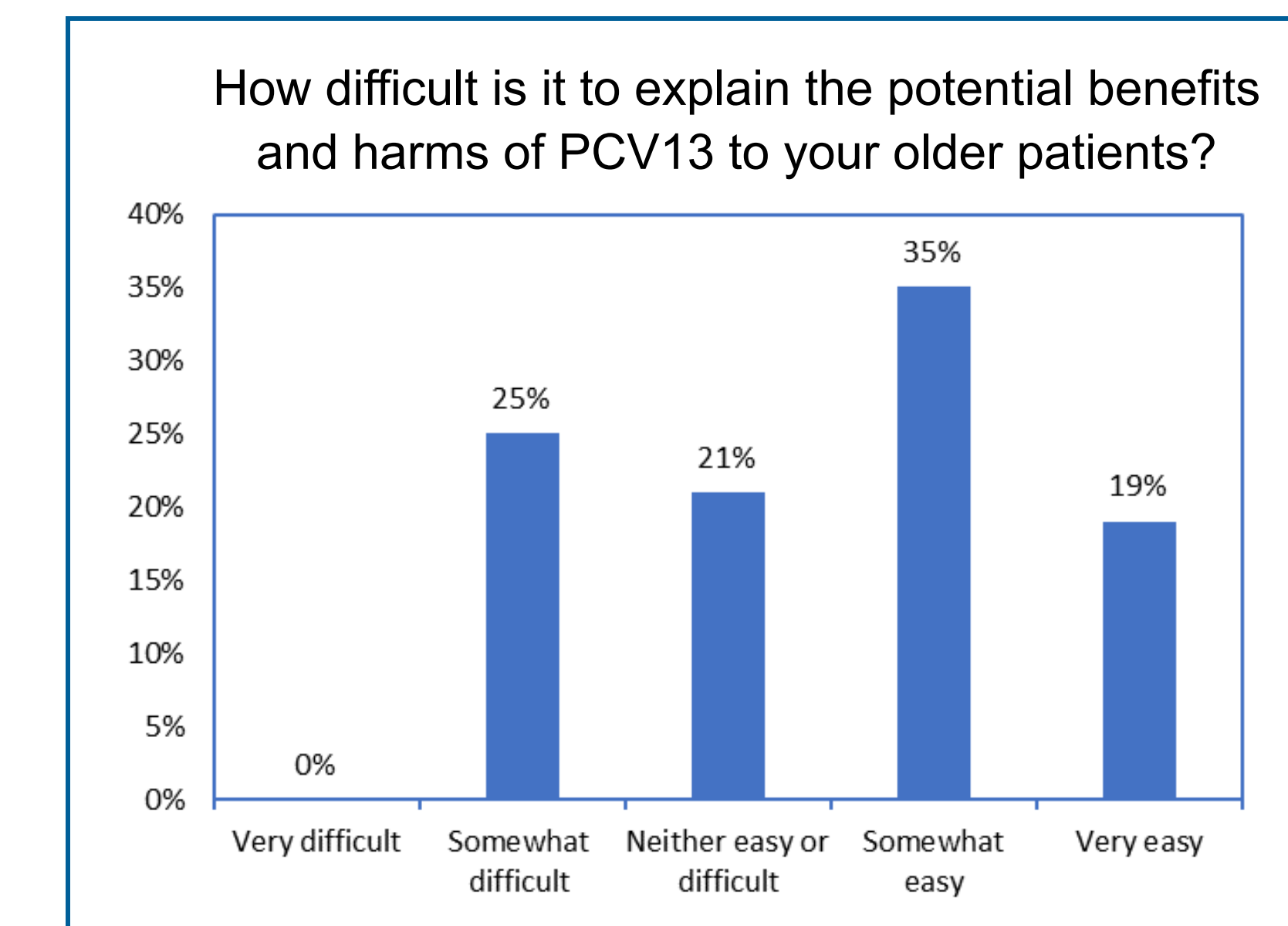
27% of respondents indicated that they or their clinic:

- Assessed immunization needs of their patients at every clinical encounter
- Used standing orders for vaccines
- Used EHR or other systems to automatically remind patients and clinic staff about vaccinations

Views on SDM

96% of respondents indicated that SDM regarding the PCV13 vaccine would be **feasible** in their practice, but

25% noted that it would be **somewhat difficult** to explain the potential harms and benefits of PCV13 to patients ≥65 years



Given the potentially severe respiratory complications of SARS-CoV-2 infection, have your attitudes toward pneumococcal vaccines in older adults changed since the onset of the pandemic? (Selected responses from both questionnaires)

“Only in that it is hard to convince people to get multiple vaccines at once, or if they prefer to come back they end up being lost to follow-up”

“I’ve been better about recommending this series”

“Even more important and also to keep hospitalizations down”

“More likely to recommend PCV13 in light of the COVID-19 pandemic to reduce risk of additional respiratory infections”

“We have backed off a little on pushing PCV-13 because of the recommended two week vaccine-free window around the time of receiving a COVID vaccine. We are prioritizing COVID prevention”

“Patients seem more willing to be vaccinated to prevent other respiratory infections”

Conclusions

- Our results provided insights into the knowledge, attitudes, and behaviors of clinicians and pharmacists regarding pneumococcal vaccines and use of SDM in adults older than 65 years**
- Despite indicating that SDM would be feasible in their practice, one-fourth of respondents noted that it would be somewhat difficult to explain potential harms and benefits of pneumococcal vaccine in adults 65 years and older**
- Results will serve as the basis for development of educational materials on pneumococcal vaccines**

Updated Questionnaire

During our project, the CDC proposed recommendations that removed the use of SDM for pneumococcal vaccines

	Past Policy	Current Policy
None of the conditions below	PCV13 based on SDM, PPSV23 for all	PCV20 OR PCV15 and PPSV23
Chronic medical conditions		
Cochlear implants, CSF leak	Both PCV13 and PPSV23	PCV20 OR PCV15 and PPSV23
Immunocompromised		

To modify the questionnaire we:

- Removed PCV-13-specific knowledge questions
- Replaced SDM and referred to discussions with patients
- Asked if respondent knew which vaccine would be used by their clinic or healthcare system (ie, PCV20 or PCV15 + PPSV23)

In December 2021 the questionnaire link was emailed UW Health General Internal Medicine clinicians

Results

Of 27 respondents:

- 67% = Physicians
- 19% = Nurse practitioners
- 15% = Physician assistants

How have you conducted discussions regarding pneumococcal vaccinations with your patients older than 65 years?

Response	% Each Response Selected
I only discuss the pneumococcal vaccine(s) if a patient asks	0%
I routinely offer the pneumococcal vaccine(s) to my patients	37%
I have provided written information regarding the pneumococcal vaccine(s) (eg, brochures, leaflets, etc.)	6%
I have discussed details and/or answered questions when a patient expressed vaccine hesitancy	29%
I have had discussions about the potential benefits and harms of the pneumococcal vaccine(s)	28%
I have not discussed pneumococcal vaccinations with my patients	0%

Which of the following practices regarding immunizations are used by you or your clinic? Please check all that apply.

Practice	% Each Response Selected
Assess immunization needs of patients at every clinical encounter	25%
Use standing orders for vaccines based on established recommendations	20%
Use electronic health records or other systems to automatically remind patients & clinic staff when vaccinations are due	26%
Conduct special events to increase patient access to immunizations (eg, flu shot clinics, drive through vaccinations)	8%
Offer patients older than 65 years the PCV13 vaccine by letter, email, or through the EHR	11%
Development and implementation of patient education to address vaccine hesitancy	2%
Use the Wisconsin Immunization Registry (WIR) to run a report about vaccination rates in your clinic	7%
None of the above	0%
Other, please describe	1%

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