Polling Places, Pharmacies, and Public Health: Vote & Vax 2012

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Abstract

US national elections, which draw sizable numbers of older voters, take place during flu-shot season and represent an untapped opportunity for large-scale delivery of vaccinations. In 2012, Vote & Vax deployed a total of 1585 clinics in 48 states; Washington, DC; Guam; Puerto Rico; and the US Virgin Islands. Approximately 934 clinics were located in pharmacies, and 651 were near polling places. Polling place clinics delivered significantly more vaccines than did pharmacies (5710 vs 3669). The delivery of vaccines was estimated at 9379, and approximately 45% of the recipients identified their race/ethnicity as African American or Hispanic. More than half of the White Vote & Vax recipients and more than two thirds of the non-White recipients were not regular flu shot recipients.

The importance of enhanced, strategic linkages between clinical care and community services is increasingly being recognized.1–3 Vote & Vax is a program designed to expand the delivery of vaccinations by helping local immunizers to offer flu shots in the community at or near polling places on or around Election Days. Although influenza vaccination is a
core public health activity, the delivery of vaccines to older adults remains limited. The Healthy People 2020 target is 70%, but only about 45% of adults aged 50 to 64 years were vaccinated against influenza during the 2010 to 2011 influenza season. Rates are particularly low among minority populations. Based on data from the 1976 to 1977 through 2006 to 2007 influenza seasons, influenza-associated deaths in the United States ranged from a low of about 3000 to a high of about 49 000.

**APPROACH**

More than 120 million Americans go to the polls in presidential election years, and more than half of voters are aged 50 years or older. There are 186 000 polling places across the United States, which are statutorily required to be accessible to persons with disabilities. This infrastructure is largely overlooked by public health practitioners but represents a potentially efficient platform to provide mass vaccinations, including reaching those who are most vulnerable to influenza.

Vote & Vax is designed to coordinate the delivery of flu shots through an informal network of community vaccine clinics established by local immunizers at or near polling places. Participation is available to any organization that immunizes or partners with an immunizing agency and that commits to the Vote & Vax principles of operation (i.e., offer vaccinations regardless of voting status or registration status, apply the same terms and prices as the agency’s other community-based clinics, and not engage in any political activity in connection with Vote & Vax).

The objective of this report was to assess the depth and breadth of Vote & Vax 2012 activities, describe those immunized, and analyze whether and how the program broadened the provision of influenza vaccinations.

**THE 2012 ELECTION**

In 2012, Vote & Vax received support from several sources. First, the Centers for Disease Control and Prevention (CDC) provided support for the organization’s staff and for giving technical assistance. Second, a group of national public health organizations provided in-kind assistance and access to their members in order for Vote & Vax to recruit immunizers. (Vote & Vax partners are listed in Sidebar 1.) Finally, Vote & Vax established partnerships with local, regional, and national pharmacy chains. Pharmacies did not provide financial support but were invited to deploy staff at nearby polling places or to create an Election Day event in their retail space.

The Vote & Vax Web site ([http://www.voteandvax.org](http://www.voteandvax.org)) was a key resource, which enabled immunizers to register and download a guidebook (*Vote & Vax: Setting Up a Successful Clinic Resource Guide*) at no cost; promotional materials for Vote & Vax also could be purchased and used by volunteer or staff immunizers (Figure 1). For the public, the Web site includes a Vote & Vax clinic finder.

With the permission of local election authorities, polling places were selected on the basis of sound public health practice and community need. Vote & Vax staff offered technical
assistance to immunizers regarding establishing sites, assessing outcomes, and deploying an individual-level survey instrument. The instrument gathered no personal identifiers from participants but collected information about insurance coverage, demographics, and influenza vaccine history.

DATA ANALYSIS

We analyzed data provided by local collaborators with R version 3.0.1 (R Core Development Team, Vienna, Austria, 2013), relying on several packages described in Wickham.\textsuperscript{8–10} We handled missing data at the clinic and individual levels with multiple imputations, as described by Honaker et al.\textsuperscript{11}

OUTCOME

A total of 1585 clinics were held in 48 states; Washington, DC; Guam; Puerto Rico; and the US Virgin Islands (Figure 2). Approximately 934 clinics were located in pharmacies, and 651 were at or near polling places. An estimated 9379 vaccines (SE = 62) were administered. Polling place clinics delivered significantly more vaccines than did pharmacy clinics: 5710 (SE = 48) and 8.8 vaccines per polling place clinic versus 3669 (SE = 69) and 3.9 vaccines per pharmacy clinic. Of the clinics, 45% were located in the South, 33% in the Midwest, and 11% each in the Northeast and West.

Vote & Vax 2012 reached diverse populations. The program vaccinated a substantial proportion of minority participants (about 45% identified their race/ethnicity as African American or Hispanic). Participants had varied insurance status (about 37% reported being uninsured or having Medicaid coverage). More than half of the White Vote & Vax recipients (51%; 308 of 603), more than two thirds of the Black (72%; 341 of 475), and more than three quarters of the Hispanic (94%; 112 of 119) recipients were not regular flu-shot recipients. Among persons who did not self-identify in any of these groupings (“other”), three quarters (75%; 46 of 61) did not get regular flu shots (Figure 3).

CONCLUSIONS

Vote & Vax was able to establish clinics across almost all US states and territories. In terms of individual reach, a large proportion of participants were not regular flu-shot recipients. Interestingly, Election Day polling places significantly outperformed pharmacies as platforms for the delivery of vaccinations, suggesting the importance of establishing nontraditional community sites for immunizations.

Despite the positive reach and use of services, several challenges remain. It takes considerable effort to inform election officials about Vote & Vax, and occasionally some reluctance was encountered. For several pharmacies, pursuing community-based activities outside traditional retail stores was a challenge because of inexperience, insufficient staffing, or potential insurance liability. In comparison with earlier Vote & Vax years, we found fewer vaccines delivered overall, and the proportion of participants aged 65 years and older had declined to 13% from 46.5%.\textsuperscript{12} This might be attributable, in part, to the recent incorporation of flu-shot delivery as a widespread practice in pharmacies. Looking ahead,
there may be a demand threshold below which it is less directly financially advantageous for immunizers to work at polling places.

**NEXT STEPS**

In response to these challenges, Vote & Vax could broaden the set of preventive services provided at polling places. Candidate services include other vaccinations, cardiovascular screening, and appointments for smoking cessation programs.

This work highlights the importance of identifying key players, understanding their roles in care delivery, knowing policies, anticipating potential barriers, and creating the capacity to prepare participants for new community-based work. Furthermore, Vote & Vax provides an example of how an infrastructure designed for civic purposes can be used for mass vaccinations and how public health activities can be tailored to accommodate any restrictions associated with these settings—in this case, Election Day activities at polling places.

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We acknowledge with considerable appreciation the contributions of our study partners who are listed in Sidebar 1. We also acknowledge the successful efforts of our many collaborators who delivered influenza vaccinations on Election Days as part of this effort.

**References**

**Vote & Vax Partners**

American Public Health Association  
Association of Immunization Managers  
Association of State and Territorial Health Officials  
Center for Chronic Disease Prevention and Health Promotion, Centers for Disease Control and Prevention  
Discount Drug Mart  
Immunization Coalitions Technical Assistance Network  
Kroger  
National Adult and Influenza Immunization Summit  
National Association of Area Agencies on Aging  
National Association of Chronic Disease Directors  
National Association of County and City Health Officials  
National Association of State Units on Aging  
North Carolina Department of Health and Human Services  
RiteAid  
RxAlly  
Shopko Pharmacy  
Thrifty White  
Virginia Department of Health  
Visiting Nurse Associations of America  
Walgreens  
White Drug
KEY FINDINGS

• The national polling place infrastructure represents an effective platform from which to deliver adult vaccinations.

• Vote & Vax reached diverse populations, with about 45% of the participants identifying their race/ethnicity as African American or Hispanic.

• Vote & Vax expanded the delivery of influenza vaccinations. More than half of all vaccinated participants were not regular flu-shot recipients; this proportion was significantly higher among African American and Hispanic participants.

• Vote & Vax immunizers provided more influenza vaccinations at polling places than at pharmacies on Election Days, despite a larger number of pharmacy-based clinics.
FIGURE 1.
Vote & Vax participating immunizers (volunteers at the University of Maryland School of Pharmacy) with Vote & Vax promotional materials.
FIGURE 2.
Vote & Vax clinics (including polling places and participating pharmacies) in 48 states; Washington, DC; Guam; Puerto Rico; and the US Virgin Islands: Election Days, 2012.

Note. Most Vote & Vax 2012 flu-shot recipients reported either that they did not receive a flu shot during the previous flu-shot season or that they would not have received a flu shot other than at the polling place.
FIGURE 3.
Proportion of nonregular flu-shot recipients by racial/ethnic group: Vote & Vax 2012.