PRINCIPLES AND PRACTICES FOR VACCINE TRUST

Janice E. Graham | April 21, 2021

Janice E. Graham is professor of pediatrics (infectious diseases) and medical anthropology at Dalhousie University

While seniors and other vulnerable communities continue to benefit from vaccines, younger Canadians suffering from the impact of COVID-19 variants are now filling up ICUs in zones that eluded public health countermeasures. Morbidity and mortality are riding waves of geopolitics despite our knowledge of the links between COVID and dense living and working conditions, especially for racialized, frail, and poor Canadians. We also know that stigmatization and disinformation are steep challenges, that reducing disease transmission has to be our primary goal; and that vaccines for everyone everywhere are a part of the pandemic endgame.

In Canada there are currently three COVID-19 vaccines available and our public health officials are working 24-7 anaylsing the latest epidemiological data to determine the best options for different communities. What information is needed to gain trust that the vaccines are safe against the uncertainties of a changing disease? Should one wait for an mRNA vaccine (Pfizer-BioNTech's BNT162b2 or Moderna's mRNA-127) or get the ChAdOx1 (Oxford-Astra Zeneca) which is available now? Context, place and political will[1] all figure into decisions around balancing benefits with risks of harm. An individual's risk of COVID-19 infection depends on the places they live, work and hangout. Halifax currently has an infection rate around three per day while Calgary and Peel are at 581 and 775, respectively.[2] Vaccines alone cannot control COVID-19 disease and its variants; they rely on enough people in these communities getting immunized and continuing to practice public health precautions to prevent transmission.[3,4] Our hospitals are treating the sick and our public health officials are doing their best to promote social interventions and distribute vaccines for your community as fast as they can. When risk of getting the disease outweighs the risk of an adverse event following vaccination, then it makes sense to get vaccinated.

A combination of biomedical, public health, and social research has developed new tests, therapies and vaccines, as well as a better health system, to control and limit future outbreaks of this disease. Trust in these measures, however, arrives on foot and leaves on horseback; it demands open and robust evidence[5] and long-term commitments to communities.

Health Canada, the Public Health Agency of Canada, the National Advisory Committee on Immunization and provincial, territorial and Indigenous public health services are learning that better coordination to

[1] https://theconversation.com/the-secret-to-how-atlantic-canada-weathered-the-covid-19-storm-political-will-158193?fbclid=IwAR27QLQ2uk0q0DbbQWa6S02MeqqZhkdVTQrc-5KTOxtsAx-EFoQlt9jfUc
[2] https://health-infobase.canada.ca/covid-19/covidtrends/?HR=1&mapOpen=false
[3] https://www.reuters.com/article/health-coronavirus-britain/update-4-world-faces-around-4000-covid-19-variants-as-britain-explores-mixed-vaccine-shots-idUSL8N2KA232
[4] https://www.statnews.com/2021/01/04/britain-takes-a-gamble-with-covid-19-vaccines-upping-the-stakes-for-the-rest-of-us/
[5] O'Neill O. Trust, trustworthiness, and accountability. In: Morris N, Vines D , eds. *Capital failure: rebuilding trust in financial services*. Oxford: Oxford University Press, 2014: 172–92.

engage and represent the needs of the people in all our communities is needed. In order to deploy the best care and solutions based on the latest evidence, local disease detection along with healthcare at the community level need to be linked to wider provincial and national health systems of surveillance and response[6], and encompass these six principles and practices toward building vaccine trust:

1. Transparency and open access to all clinical trial and manufacturing quality control data (including vaccine components) for independent appraisal of decisions surrounding authorization, procurement and deployment;
2. Robust post-approval monitoring and active surveillance to detect rare but serious adverse events, as well as vaccine failures, supported by a coordinated national vaccine registry;
3. Assurance of a no-fault vaccine injury support program (VISP) in the event of potential risks from accelerated clinical trials and authorization processes;
4. Clear, consistent and timely communication to health care providers and communities that provides the latest metrics for risk of infection, hospitalization, long-term effects, and death in a city, neighbourhood or workplace, balanced against the relative risks of rare but severe adverse events from vaccination. In this way the most robust evidence-based recommendations for vaccination can be tailored to that particular community's circumstances;
5. Timely and equitable access to, and the fair distribution of approved vaccines following the principles of allocation and prioritization.[7] These principles must include challenging the intellectual property protections that prevent the manufacturing and distribution of the vaccines needed to control this pandemic;[8]
6. Strengthening and sustaining community-based public health, including immunization programs.

COVID-19 has reminded governments about the benefits of being prepared for emergencies, and the consequences of a lapse in vigilance. A coordinated healthcare system that is open and trusted and capable of rapidly responding to a public health emergency can contribute to resolving health inequalities. We need to make sure that we do our part as individuals, communities and governments in controlling this pandemic and that includes equitable supply of vaccines and community-based healthcare available everywhere. Reliable, trustworthy science, sustainable public health and social justice will help build a better post pandemic future.

This article initially appeared in the Globe and Mail on April 21, 2021.

[6]Graham, J.E**.,** Lees, S., Le Marcis F., Faye, S., Ronse, M., Lorway, R., Abramowitz, S., Peeters Grietens, K. (2018) Prepared for the "unexpected"? Lessons from the 2014-16 Ebola epidemic in West Africa on integrating emergent theory designs into outbreak response. BMJ Global Health 2018;3:e000990. doi:10.1136/bmjgh-2018-000990 https://gh.bmj.com/content/3/4/e000990

[7] https://apps.who.int/gb/ebwha/pdf_files/WHA73/A73_R1-en.pdf

[8] https://www.theglobeandmail.com/world/article-momentum-grows-for-vaccine-technology-sharing-as-shortages-worsen/