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Mpox Immunization Coverage among 2SLGBTQI+ 2024-25

Methodological Report

Prepared for the Public Health Agency of Canada

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Ce rapport est aussi disponible en français.

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This report presents the methodological details for the Mpox Immunization Coverage Survey among 2SLGBTQI+ 2025 conducted by Advanis Inc. on behalf of the Public Health Agency of Canada (PHAC). The survey was administered among 5,823 members of the adult Canadian general public, between December 17th, 2024, and January 31st, 2025.

Ce rapport est aussi disponible en français sous le titre: Enquête sur la couverture vaccinale contre la variole simienne (la Mpox) chez les 2ELGBTQI+ 2024-25 : rapport méthodologique.

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1. Executive Summary

1.1 Background

With the emergence of the multi-country outbreak of mpox (formerly referred to as “monkeypox”) in May 2022, Canada launched an unprecedented immunization campaign to help control the spread of the virus¹. In particular, the vaccination campaign has targeted key, at-risk populations following the National Advisory Committee on Immunization’s (NACI) guidance for prevention among 2SLGBTQI+ and men who have sex with men (MSM) communities, with some variance in the vaccination approach in provinces and territories. In 2023, PHAC commissioned an initial study to determine vaccination coverage estimates among these populations at the national level. Ongoing surveillance information is required to monitor the mpox situation in Canada, to help inform public health vaccination programs and prevention strategy initiatives.

The purpose of this survey was to provide an update to the information on mpox vaccine coverage for the 2SLGBTQI+ as well as MSM adult populations, and continue to help understand the knowledge, attitudes, and beliefs concerning mpox vaccines (e.g., vaccine effectiveness, vaccine safety, vaccine relevance). This includes exploring reasons for vaccine hesitancy and vaccine refusal and the impact this has on vaccine uptake. Its purpose was also to identify risk factors for transmission of mpox as well as these populations’ willingness to limit high-risk activities amid the current mpox outbreak.

Results from this survey will help inform Canadian mpox immunization programs, by monitoring progress towards stepping up mpox vaccine coverage rates among populations at higher risk of mpox infection. In addition, PHAC will use results from this surveillance initiative to promote vaccine uptake and leverage public opinion research to address evolving issues relating to mpox vaccine hesitancy/acceptance and infection risk. This information will inform policy development and public education and awareness initiatives tailored to 2SLGBTQI+ and additional populations at risk in Canada, by identifying areas in which interventions are needed to reach adequate vaccine coverage for these populations.

The survey applied a sex and gender-based analysis plus (SGBA Plus) lens, considering the multiple identities and contextual factors of 2SLGBTQI+ people or those who are MSM living in Canada².

1.2 Objectives

The primary objective of this survey was to continue to measure mpox immunization coverage-related information for 2SLGBTQI+ as well as additional populations at greatest risk of mpox infection and/or severe outcomes in Canada using the enhanced surveillance tool developed for the 2023 and 2024 surveys.

Specifically, this surveillance survey aimed to:

- Understand awareness, knowledge, attitudes and beliefs toward mpox vaccines among the general population and at-risk groups,
- Understand potential sources of exposure within households, from non-household contacts and travel-related contacts;
- Determine Mpox immunization status,

¹ <https://www.canada.ca/en/public-health/services/diseases/monkeypox.html>

² <https://women-gender-equality.canada.ca/en/free-to-be-me/federal-2slgbtqi-plus-action-plan/survey-findings/quick-stats.html>

- Measure intent to get vaccinated for those not yet vaccinated,
- Identify reasons for non-vaccination (including barriers),
- Identify current sources of information on mpox vaccines, and
- Identify socio-demographic characteristics potentially linked to inequalities in vaccination uptake.

The second objective was to document the socioeconomic, cognitive, and motivational factors associated with low uptake of the mpox vaccine among these at-risk populations.

1.3 Methodology

Data collection started December 17, 2024, and ended January 31, 2025, and was conducted by Advanis.

A sample of 26,631 Canadians aged 18 or older were called through the use of Advanis' General Population Representative Sample (GPRS) and invited to participate in an online survey. To reach members of the 2SLGBTQI+ population, recruitment was completed using information Advanis had profiled within the GPRS database to ensure quota minimums were met. A total of 18,428 recruits agreed to participate and received an email or SMS inviting them to take part in the survey.

Of those invited, 5,824 answered the online survey. However, 1 case was removed from the data due to non-valid or inappropriate verbatim responses. Hence, 5,823 were considered to have completed the survey. Of those, 1054 (18.1%) were non-heterosexual members of the 2SLGBTQI+ population, 50 (0.9%) were heterosexual members of the 2SLGBTQI+ population (e.g., a heterosexual transgender person) and 39 (0.7%) were heterosexual men who had male sexual partners in the last 12 months.

Survey results were weighted by age group, gender and sexual orientation. The results are based on responses from 5,823 Canadians across all provinces and territories. Recruitment ensured quotas were reached for key sub-populations to ensure statistical relevance and representativeness. Results can be extrapolated to the Canadian population according to sexual orientation.

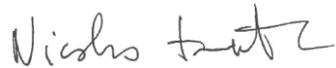
1.4 Contract Value

The contract value for this study was \$124,263.84 (including HST).

1.5 Political Neutrality Requirement

I hereby certify as a Senior Officer of Advanis that the deliverables fully comply with the Government of Canada's political neutrality requirements outlined in the Communications Policy of the Government of Canada and Procedures for Planning and Contracting Public Opinion Research.

Specifically, the deliverables do not contain any reference to electoral voting intentions, political party preferences, standings with the electorate, or ratings of the performance of a political party or its leader.



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2. Methodology

The Public Health Agency of Canada (PHAC) sought to gain a better understanding of mpox immunization coverage-related information for 2SLGBTQI+ people and MSM living in Canada. PHAC contracted Advanis to conduct the *Mpox Immunization Coverage Survey among 2SLGBTQI+ 2025*. It was initially planned to be a 10-minute online survey of Canadians 18 years and older.

The project used Advanis' proprietary General Population Random Sample (GPRS), using an IVR-to-Web and CATI-to-Web methodology to contact potential respondents. This consists of using our proprietary interactive voice response (IVR) system and our in-house CATI call center to conduct random digit dialing (RDD) to recruit respondents to be part of the GPRS sample. This method is probability-based; that is, every recruit has an equal and known chance of being invited to participate. Advanis then used a two-step approach where people who are part of our GPRS sample were recruited by telephone to participate in an online web survey. There can be an unknown bias since not everyone agrees to participate in studies. The inherent potential bias of our GPRS sample is not different than for other random sampling approaches.

Respondents were recruited to the online survey by either email or SMS (text message), based on their preference stated at the time of the phone recruitment. After the initial invitation, if respondents had not yet completed the survey, they were sent a reminder message. Reminder messages were sent 3 and 6 days after the initial recruitment. To reach members of the 2SLGBTQI+ population, recruitment was completed using information's Advanis had on profile within the GPRS database to ensure quota minimums were met.

2.1 Survey Questionnaire

The questions for this survey were designed by the Public Health Agency of Canada and supplied to Advanis. The questionnaire contained questions about mpox vaccination status, barriers to vaccination, knowledge attitudes and beliefs related to vaccination, demographics, and questions about general health.

The Government of Canada's standards for pre-testing were adhered to, pretests were conducted in both English and French. The pretest was conducted on December 17, 2024. During this pretest, 182 people were recruited by phone in English and French. This led to 59 completed online surveys (29 French, and 30 English). After the pretest, one small change of wording was made to question C13. The pretest data was retained in the final dataset.

2.2 Sampling and Administration

To address the objectives, an online survey was conducted with those who live in Canada, aged 18 and older, with special focus on those who identify as 2SLGBTQI+ community members – estimated 4% of Canadian population.

Other specific audiences of interest to be captured included:

- Men who have sex with men (MSM) - which is estimated 3.3% of men or 1.7% of Canadian population³.

³ LGBTQ2+ communities in Canada: A demographic snapshot

- Individuals with multiple sexual partners in past 12 months – estimated to be 37% of 15-24 year olds in 2015/2016⁴,
- Health care workers – estimated 7% of the Canadian population⁵,
- Immunocompromised individuals – estimated 14% of the population⁶, and
- Pregnant individuals – estimated ~ 1% of the Canadian population based on number of births in 2021⁷.

Specifically, the 2SLGBTQI+ population was sampled based on how participants self-identify, whereas the other specific audiences did not have a set sample target (natural fallout) but were identified based on number of sexual partners reported, gender/sex of their partner, occupation, and health status indicators captured in the survey. Overall, 26,631 phone numbers were called and 18,428 people were recruited to participate in the survey. Of those, 5,824 completed the online survey, but 1 case was removed from the data due to non-valid responses (e.g., a person giving inappropriate verbatim responses). Hence, 5,823 (4,626 in English and 1,197 in French) were considered to have completed the survey for an overall response rate of 31.6%, and a margin of error of +/-1.1% (19 times out of 20 at a 95% confidence interval). The average length of the survey (mean) was 10.48 minutes for participants.

Table 1 provides information on the number of invitations sent according to the information we had in the sample prior to data collection.

Table 1: Invitations sent by group

| Population Group Field Details | Total | Flagged as 2SLGBTQI+* | Not flagged as 2SLGBTQI+* |
|--|--------|-----------------------|---------------------------|
| Invited | 18,428 | 1863 | 16,565 |
| Screened Out** | 1 | n/a | 1 |
| Completed | 5,823 | 686 | 5,137 |
| Response rate (completed + screened out / invited) | 31.6% | 36,8% | 31,0% |

*These results are taken from sample values that were available prior to data collection. We used known characteristics from our GPRS sample to identify if potential respondents were 2SLGBTQI+ or not. This information was only used to target respondents and may not align with survey responses on gender and sexual orientation. This is then different than the 2SLGBTQI+ definition taken from survey responses.

**Screened out participant is the 1 respondent who gave invalid responses in open ends within the survey.

The next table presents the number of completed surveys by population groups.

Table 2: Completed surveys by population groups

| Population Group (based on both gender and sexual orientation) | Number of respondents | Proportion (%) | Margin of error |
|--|-----------------------|----------------|-----------------|
| Heterosexual cisgender men | 2,147 | 36.9% | +/-2.1% |
| Heterosexual cisgender women | 2,331 | 40.0% | +/-2.0% |
| 2SLGBTQI+* | 1111 | 19.1% | +/-2.9% |
| Missing information to assign** | 234 | 4.2% | --- |
| Total | 5,823 | 100% | +/-1.3% |

*Includes people who are heterosexual but are considered 2SLGBTQI+ because of their gender (e.g., a transgender, heterosexual person).

** These respondents did not provide a response when asked to give their gender or sexual orientation.

⁴ Sexual behaviours, condom use and other contraceptive methods among 15- to 24-year-olds in Canada (statcan.gc.ca)

⁵ COVID-19 Infections Among Healthcare Workers and Other People Working in Healthcare Settings

⁶ Health-related concerns and precautions during the COVID-19 pandemic: A comparison of Canadians with and without underlying health conditions (statcan.gc.ca)

⁷ Births, 2021

Among the 1,111 2SLGBTQI+, 686 (61.7 %) were flagged as LGBTQ in our sample prior to data collection.

2.3 Weighting and Data Cleaning

For this project, data was gathered for gender, sexual orientation and age. A request to Statistics Canada was made to have access to most up-to-date population estimation on those 3 variables. Those estimations are from the Canadian Community Health Survey (CCHS) for the years of 2022 to 2023. Even with Statistics Canada's precision, data about heterosexual men having sexual relations with other men is unavailable. That means, a weighting scheme that includes that level of precision in terms of behavior is impossible and data cannot be weighted based on the MSM definitions⁸.

A direct weighting approach was used for 2SLGBTQI+ sample vs not part of 2SLGBTQI+. The data was weighted by age group (less than 35 years and 35+ years) and by the following population groups:

- Heterosexual men+
- Homosexual men+
- Bisexual, pansexual or other sexual orientation men+
- Non responses for sexual orientation men+
- Heterosexual women+
- Homosexual women+
- Bisexual, pansexual or other sexual orientation women+
- Non responses for sexual orientation women+

The non-binary, two-spirit/bi-spirit, and other genders population is small, and data aggregation to a two-category gender variable (denoted by the "+" symbol) is often used to protect the confidentiality of responses provided. Non-binary persons, and two-spirit/bi-spirit persons, and persons of other genders were randomly classified as men+ and as women+ (total $n = 150$) to reflect the categories of the Statistics Canada CCHS. This results in two gender categories: "men+" and "women+". The men+ category includes cisgender men, transgender men and about 50 % of persons of other genders. The women+ category includes cisgender women, transgender women and about 50 % of persons of other genders.

Respondents who did not provide information on their gender were recoded based on their sex at birth into one of the two gender categories (men+ or women+). Those who did not provide information for their sexual orientation were weighted as "non-response" using the non-response information from the CCHS ($n = 204$).

Data cleaning involved creating variables for each of the specific audiences of interest, so that analysis can be easily performed for each group. "Other, specify" comments were reviewed and back coded into existing levels where required (for questions a2, a4 and s3).

We were not able to conduct non-response adjustments since the non-respondent's information is unknown. No data was available to do such a correction. There were no extreme weights.

⁸ The variable 'MSM Behaviour' is an aggregate variable to describe men and transgender men who had had a male sexual partner in the previous 12 months (as identified at S4b). The variable 'MSM Communication' is an aggregate variable to describe men and transgender men who self-identify as men who have sex with men (regardless of behaviour in the previous 12 months) and heterosexual men who have had a sexual experience with someone of the same-sex in the previous 12 months.

2.4 Quality Control

Advanis employs a number of quality control measures to ensure success across the entire life cycle of the project. These measures are detailed below.

Survey Programming: Advanis utilizes technology to maximize quality control in survey programming. Having developed a proprietary survey engine tool, Advanis professionals are able to design and program a survey in a browser-based environment, eliminating the need to involve a programmer who is less familiar with the survey subject matter. The survey was thoroughly pre-tested by Advanis' project team members, as well as by non-team members (non-team members provide "fresh eyes" for catching potential errors).

CATI Methodology: The CATI recruit script was programmed on Advanis' proprietary CATI platform with no unforeseen challenges. Advanis was able to leverage its experience for the survey programming and the reminder process to achieve high quality standards. Advanis implemented the following to ensure the highest quality data collection:

- Trained the interviewers to best understand the study's objectives and to ensure that they were able to pronounce and understand the survey wording.
- Detailed call records were kept by the automated CATI system, and were monitored for productivity analysis (i.e., not subject to human error).
- The recruit scripts were pre-tested for best possible flow.
- Our average interviewer employment tenure is very high compared to industry standards, resulting in a team of interviewers who are more experienced and knowledgeable regarding the target audience.
- Advanis' Quality Assurance team listened to the actual recordings of ten percent of completed surveys and compared the responses to those entered by the interviewer, to ensure that responses were properly recorded. This is in addition to the live monitoring done by field supervisors.
- Team Supervisors conducted regular, more formal evaluations with each interviewer, in addition to nightly monitoring of each interviewer on their team.

To ensure high interview quality, our interviewers are trained to use various interviewing techniques. As well as maintaining a professional attitude, our interviewers must also be convincing, read word-for-word, take notes, systematically confirm the information given and listen to the respondent. Advanis has also created internal tools within the survey script for interviewers allowing them to use the phonetic alphabet to confirm email address spelling, (e.g., a for alpha, b for bravo, etc.) to help reduce the amount of bounced email addresses. However, should bounced emails occur, Advanis also has developed additional tools that allow for someone to re-listen to the recording and easily adjust to correct the email address.

Web Methodology: All Advanis web surveys are hosted internally by Advanis, and employ a rigorous and stringent set of data collection control mechanisms to ensure the highest quality for the data collected, including:

- Respondents have a unique access code to ensure that only that participant can complete the online survey.
- Extensive internal logic checks are programmed directly into the survey to ensure logical responses.
- Web surveys are implemented using Advanis' proprietary software (which is designed to handle complicated survey formats).

- Advanis administers a detailed internal test and an external pretest to ensure that the survey instrument is working as planned.
- The questionnaire is tested in multiple browsers and PHAC is provided with a link so that they can do internal testing.

Data Handling and Reporting: For the data collected, Advanis develops rules to check the validity of the data. These rules include items such as:

- Time taken to complete the survey
- Checking for verbatims that are gibberish or don't make sense
- And, of course, rigorous checks are completed to ensure the data is accurate and error-free according to the questionnaire logic (skip patterns).

All data cleaning performed on projects is outlined and tracked in an internal spec document so they can be QA'd and signed off on. The original raw data file is never overwritten, so that if an error is discovered in our code, we can quickly and easily rerun things to produce a new data file. Individuals developing code incorporate internal checks in their code (e.g., crosstabs) to ensure the adjustment had the desired effect. In addition, all recordings are reviewed by another team member or technical specialist for accuracy.

3. Non-response Bias

Non-response bias occurs when non-responders differ in a meaningful way from respondents and this difference impacts the information gathered. It is difficult to assess the presence of non-response bias since information about why non-responders did not participate is usually unavailable. That said, one way to gauge the potential impacts of non-response bias is to evaluate if the sample is representative by comparing the respondents' characteristics and gauge if they reflect known population characteristics. Where possible, we can check the distribution of respondents across various demographics (e.g., age and gender) and geographic categories and compare those distributions against known population characteristics. If the variation is fairly small and we have no reason to believe there are other factors impacting respondents' willingness to participate, we can conclude that the likelihood of non-response bias impacting the information gathered in the study is minimal. This is the case with the current study.

Several strategies were employed to increase response rates and reduce the effects of non-response bias. This includes:

- Recruiting respondents by telephone.
- Outpulsing a local phone number (rather than a toll-free number) which increases pick-up rates (reducing call screening).
- Systematically setting the next call date and time based on the outcome of the current call, which ensures that each respondent is called methodically across days of the week and times of the day. Especially for respondents that are difficult to reach, this maximizes the likelihood of reaching them.
- Collecting both email address and telephone number for recruitment so that if the email address does bounce, we have the opportunity to contact them via SMS message if they agree.
- Offering the survey in both official languages (English and French) to maximize ease of completion.

4. Guidelines for Analysis and Release

When doing an analysis, it is important to align the analysis plan with the weighting scheme. The weights adjust the data to better reflect the population based on parameters that have been chosen to maximize the level of detail without creating distortions due to extreme weights (an extreme weight will occur when a population group is represented by a proportionally smaller subset of respondents compared to other population groups, thus introducing an important risk of bias due to their specific profile).

For this survey, the basic sociodemographic information that should be used in the analysis of results are:

- Age group
 - 18 to 34 years
 - 35+ years
- Gender+
 - Women+
 - Men+
- Sexual orientation
 - Heterosexual
 - Gay/ Lesbian
 - Bisexual/ Pansexual
 - Other
 - Non-response

Using groupings other than the ones described above could potentially produce distorted data. As these results would be inaccurate based on how the weights were calculated, we strongly advise not to report any results that are not aligned with these specified categories.

The banners provided include the groupings specified above for gender and age, being part of the 2SLGBTQ+ group or not and some net categories as requested by the research team to facilitate data interpretation. It is to be noted that data was not weighted based on the full gender breakdown by sexual orientation but grouped in a binary category (gender+). This implies that any analysis done on a more precise gender definition or combination of gender and sexual orientation (like the MSM definitions) needs to be interpreted with caution because it is not generalizable and cannot be extrapolated to the population. The 2SLGBTQI+ community is defined as non-cisgendered or non-heterosexual individuals as it is self-declared in the survey. Respondents that refused to answer both gender and sexual orientation questions are not classified as part of the 2SLGBTQI+ community.

Results for question S4a and S4b (see appendix B) and any variable created using responses to those questions should also be interpreted with caution. Indeed, social desirability bias might have affected responses, and any analysis must be mindful of its potential impact on the results.

Any results with an unweighted base size (denominator) of less than 30 (but 10 or more) should be interpreted with caution.⁹⁻¹⁰ This is due to the increased coefficient of variation and, hence, there are larger confidence intervals around results with smaller bases. Furthermore, for confidentiality purposes, any results with a base of less than 10 should be suppressed.

For all estimates based on a denominator size of 30 or more, the following guidelines for data suppression related to coefficient of variations (CV) should be used when reporting estimates:⁹

⁹ CDC. National Center for Health Statistics Data Presentation Standards for Proportions. 2017.

¹⁰ Statistics Canada. Canadian Community Health Survey User Guide. 2021.

| Type of Estimate | CV (in %) ¹¹ | Guidelines |
|------------------|-------------------------|---|
| Acceptable | $CV \leq 15.0$ | Estimates can be considered for general unrestricted release. Requires no special notation. |
| Marginal | $15.0 < CV \leq 35.0$ | Estimates can be considered for general unrestricted release but should be accompanied by a warning cautioning users of the high sampling variability associated with the estimate. |
| Unacceptable | $CV > 35.0$ | It is recommended to not release estimates of unacceptable quality. |

Examining the confidence interval of the estimate will provide further indication of the quality of the estimate in terms of the variability. Long confidence intervals indicate less precision in the estimate while smaller confidence intervals indicate greater precision. When assessing the trustworthiness of sample proportions, the confidence intervals of estimates should be taken into account.⁹

4.1 Rounding Guidelines

Users are urged to adhere to the following rounding guidelines for estimates.

- Estimates in the main body of a statistical table are to be rounded to the nearest hundred units using the normal rounding technique. In normal rounding, if the first or only digit to be dropped is 0 to 4, the last digit to be retained is not changed. If the first or only digit to be dropped is 5 to 9, the last digit to be retained is raised by one. For example, in normal rounding to the nearest 100, if the last two digits are between 00 and 49, they are changed to 00 and the preceding digit (the hundreds digits) is left unchanged. If the last digits are between 50 and 99, they are changed to 00 and the preceding digit is increased by 1.
- Marginal sub-totals and totals in statistical tables are to be derived from their corresponding unrounded components and then are to be rounded themselves to the nearest 100 units using normal rounding.
- Averages, rates and percentages are to be computed from un-rounded components (i.e. numerators and/or denominators) and then are to be rounded themselves to one decimal using normal rounding. In normal rounding to a single digit, if the final or only digit to be dropped is 0 to 4, the last digit to be retained is not changed. If the first or only digit to be dropped is 5 to 9, the last digit to be retained is increased by 1.
- Under no circumstances are un-rounded estimates to be published or otherwise released by users. Un-rounded estimates imply greater precision than actually exists.

¹¹ CV= (standard error / coefficient) * 100 where the coefficient is either the regression coefficient or the proportion estimate.

5. Appendices

Appendix A: Weights

| age_w | gender_plus | sex_orientation | Count | Min | Max | Sum |
|----------------------|-------------|---------------------|-------|-------|-------|------|
| 18 to 34 years old | Women+ | Heterosexual | 350 | 1,845 | 1,845 | 646 |
| | | Gay/ Lesbian | 32 | 0,515 | 0,515 | 16 |
| | | Bisexual/ Pansexual | 151 | 0,57 | 0,57 | 86 |
| | | Other | 20 | 0,472 | 0,472 | 9 |
| | | Non-response | 12 | 1,859 | 1,859 | 22 |
| | Men+ | Heterosexual | 406 | 1,838 | 1,838 | 746 |
| | | Gay/ Lesbian | 80 | 0,319 | 0,319 | 26 |
| | | Bisexual/ Pansexual | 89 | 0,376 | 0,376 | 33 |
| | | Other | 19 | 0,194 | 0,194 | 4 |
| | | Non-response | 17 | 1,089 | 1,089 | 19 |
| 35 years old or over | Women+ | Heterosexual | 2019 | 1,009 | 1,009 | 2036 |
| | | Gay/ Lesbian | 117 | 0,202 | 0,202 | 24 |
| | | Bisexual/ Pansexual | 167 | 0,192 | 0,192 | 32 |
| | | Other | 27 | 0,153 | 0,153 | 4 |
| | | Non-response | 92 | 0,865 | 0,865 | 80 |
| | Men+ | Heterosexual | 1790 | 1,072 | 1,072 | 1918 |
| | | Gay/ Lesbian | 223 | 0,178 | 0,178 | 40 |
| | | Bisexual/ Pansexual | 116 | 0,159 | 0,159 | 18 |
| | | Other | 13 | 0,104 | 0,104 | 1 |
| | | Non-response | 83 | 0,746 | 0,746 | 62 |

Mpox Immunization Coverage among 2SLGBTQI+ and MSM 2024-25

Government of Canada (Non-protected)

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Languages: English, French

Section Login page

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Page Consent Form

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Invitation to Participate

Si vous préférez répondre à l'étude en français, veuillez cliquer sur français dans le coin supérieur droit de l'écran.

You have been invited to participate in a public health study of knowledge, attitudes and experiences about public health and sexual health issues. The Public Health Agency of Canada has contracted an independent public opinion research company, Advanis (opens in a new window) (<https://advanis.net>) to conduct the research on the Public Health Agency of Canada's behalf. TellCityHall is one of Advanis' data collection methods.

The online survey will take approximately 10 minutes to complete and is voluntary and confidential. Your responses will not be linked to any personally identifiable information, to protect your anonymity.

For more information about this survey and how the data will be used, please see below. If you agree to participate in this survey, please click on the following button to continue:

Privacy Statement

Participation in this study is voluntary and you can withdraw at any time without any impact to you. There will be no consequences if you decide not to participate. You may skip questions that you do not feel comfortable answering by clicking "Prefer not to answer", where applicable. You may also complete the survey in several sessions and from different devices. If you get interrupted while doing the survey, you can click on the same link to pick up right where you left off. Once data has been collected, please note that researchers have no way of knowing which data belongs to which participant. The results from partially completed or abandoned surveys will be deleted.

What will you be asked to do?

You will be asked questions about yourself (e.g., age, gender) and questions related to the mpox and COVID-19 vaccines. Please note that certain questions will be asked at the start of the survey to determine if you are eligible to participate. If you are not eligible to participate, your data will be removed and destroyed.

What are the benefits of participating?

By participating, you are helping to generate data which will help to improve the health and well-being of Canadians by providing public health authorities with the information they need to ensure health equity.

Why are we collecting your information?

The aim of this survey is to gain an understanding about knowledge, attitudes, and experiences related to public health and sexual health topics in Canada.

You will be asked questions, such as age, gender, sexual orientation and ethnicity in order to better understand knowledge, attitudes, and experiences across different key populations. We will not ask you to provide us with any information that could directly identify you, such as name(s), or full date of birth and data will be stored on password-protected computers. However, in exceptional circumstances, individual responses in combination with other available information could lead to identifying you. Protection of your personal information is very important to us, and we will make every effort to safeguard it and reduce the risk that you are identified.

It is possible that some questions may be triggering to some people. Risks to participants will be minimized by providing a note before these questions appear. You have the right to skip any questions you are not comfortable answering.

What is the authority to collect the information?

The information you provide to the Public Health Agency of Canada is collected by the Centre for Immunization Surveillance under the authority of section 4 of the Department of Health Act and Section 3 of the Public Health Agency of Canada Act and handled in accordance with the *Privacy Act*.

Will we use or share your personal information for any other reason?

The survey firm, Advanis (<https://advanis.net>), will be responsible for collecting survey data from all participants. Once data collection is complete, Advanis will provide the Public Health Agency of Canada with a dataset that will not include any individual responses to reduce the risk that you could be identified. All the responses received will be grouped for analysis and presented in

grouped form.

The dataset will also be available by the Public Health Agency to federal and provincial governments, organizations, and researchers across Canada, if requested. Any reports or publications produced based on this research will use grouped data and will not identify you or link you to these survey results. In some cases, anonymized information or data may be disclosed without your consent for purposes not outlined in this Statement pursuant to subsection 8(2) of the Privacy Act.

Your answers will not be attributed to you and the information you provide will be administered according to the requirements of the Privacy Act, the Access to Information Act, and any other pertinent legislation. Click to view Advanis' privacy policy (opens in a new window) (<http://www.tellcityhall.ca/privacy.html>).

What are your rights?

You have a right to complain to the Privacy Commissioner of Canada if you feel your personal information has not been handled properly.

If you have any questions or concerns about the survey or the information we are collecting, please e-mail: survey+healthphac202425@tellcityhall.ca (<mailto:survey+healthphac202425@tellcityhall.ca>).

For technical support with the survey, accessibility requirements, or to request to complete the survey over the phone you can contact survey+healthphac202425@tellcityhall.ca (<mailto:survey+healthphac202425@tellcityhall.ca>).

For more information about mpox vaccination: <https://www.canada.ca/en/public-health/services/diseases/mpox.html> (opens in a new window) (<https://www.canada.ca/en/public-health/services/diseases/mpox.html>).

The collection of your personal information is described in Info Source at [infosource.gc.ca](https://www.canada.ca/en/health-canada/corporate/about-health-canada/activities-responsibilities/access-information-privacy/info-source-federal-government-employee-information.html#a5.4) (opens in a new window) (<https://www.canada.ca/en/health-canada/corporate/about-health-canada/activities-responsibilities/access-information-privacy/info-source-federal-government-employee-information.html#a5.4>). Refer to the class of personal information entitled Health Related Research.

This project has been registered with the Canadian Research Insights Council's (CRIC) under number: 20241213-AD188. CRIC website (<https://www.canadianresearchinsightscouncil.ca/rvs/home/>).

- 1 If you require a screen reader or assistive device to complete this survey, check this box to access a compatible version

- 2 Start Survey

Section Survey Questions

S1, S1a, T1NotAdult, T1NotAdult1, S2, A8, A9, B1, B2, B3, C12a, B4, B4a, B4b, C13

Page Introduction

S1

How old are you?

(Show if Web) <<numericinstruction>>

Minimum: 0, Maximum: 100

_____ years

- .8 I prefer not to answer

S1a *Show if YoB Prefer not to answer (S1 = I prefer not to answer)*

To ensure you are eligible for this survey, we need to know your age category. Can you tell us your age group?

(Show if Web) Instructions for single response question

- 1 Under 18
- 2 18 to 24
- 3 25 to 29
- 4 30 to 34
- 5 35 to 44
- 6 45 to 54
- 7 55 to 64
- 8 65 or older
- .8 I prefer not to answer

T1NotAdult *Show if Under 18 ((S1) OR (S1a = 1))*

Thank you for your interest, but for this survey you must be 18 years of age or older.

Status Code: 502

T1NotAdult1 *Show if Refused age group (S1a = I prefer not to answer)*

Thank you for your interest but for this survey we need to know your age in order to compile the results for analysis.

Status Code: 503

S2

What is your gender?

Gender refers to an individual's personal and social identity as a man, woman or a person who is not exclusively a man or a woman, for example, non-binary, agender, gender fluid, queer, or Two-Spirit.

(Show if Web) Instructions for single response question

- 1 Woman (cis-gender female; my sex assigned at birth is the same as my current gender)
- 2 Man (cis-gender male; my sex assigned at birth is the same as my current gender)
- 3 Transgender woman
- 4 Transgender man
- 6 Non-binary
- 5 Another gender
- 8 I prefer not to answer

A8

In which province or territory do you reside?

- 1 Alberta
- 2 British Columbia
- 3 Newfoundland and Labrador
- 4 Manitoba
- 5 New Brunswick
- 6 Northwest Territories
- 7 Nova Scotia
- 8 Nunavut
- 9 Ontario
- 10 Prince Edward Island
- 11 Quebec
- 12 Saskatchewan
- 13 Yukon
- 14 I live outside of Canada

A9 *Show if Reside outside Canada (A8 = 14)*

Thank you for your interest, but you must reside in Canada to complete this study.

Status Code: 501

Page General Perceived Physical Health

B1

In the following questions, we are interested in your general health status.

In general, how would you describe your **physical health**?

By physical health, we mean not only the absence of disease or injury but also a state of complete physical well-being.

(Show if Web) Instructions for single response question

- 1 Excellent
- 2 Very good
- 3 Good
- 4 Fair
- 5 Poor
- 8 I prefer not to answer
- 9 I don't know

B2

In general, how would you describe your **mental health**?

By mental a health, we mean a state of well-being, including positive mental health and mental ill-health (including mental illness).

(Show if Web) Instructions for single response question

- 1 Excellent
- 2 Very good
- 3 Good
- 4 Fair
- 5 Poor
- 8 I prefer not to answer
- 9 I don't know

Page Mpox Knowledge

B3

Mpox (formerly referred to as “monkeypox”), is a disease caused by a virus that can cause a rash or sores on the body that typically lasts 2 to 4 weeks, accompanied with a fever, headache, muscle aches, swollen lymph nodes, and exhaustion.

Mpox is spread from person-to-person, including during intimate contact and sex. Mpox has caused recently an outbreak, and Canada was among the countries affected with the global 2022-2023 outbreak. Since then, Canada is monitoring closely the mpox situation to protect the health of people in Canada.

Before today, to what extent have you seen, read or heard about mpox?

(Show if Web) Instructions for single response question

- 1 A lot
- 2 Some
- 3 A little
- 4 Not at all
- 8 I prefer not to answer
- 9 I don't know

Page Mpox Knowledge

Show if Aware of Mpox (B3 = 1,2,3)

C12a

How concerned are you about getting mpox?

(Show if Web) Instructions for single response question

- 1 Not at all concerned
- 2 A little concerned
- 3 Moderately concerned
- 4 Very concerned
- 8 I prefer not to answer
- 9 I don't know

B4

Since 2022, have you ever had an **mpox infection**?

(Show if Web) Instructions for single response question

- 1 Yes, confirmed by lab test results
- 2 Unsure if I had an mpox infection, but I had symptoms
- 3 No
- 8 I prefer not to answer
- 9 I don't know

B4a *Show if Have had mpox (B4 = 1)*

When was your mpox infection diagnosed?

Please consider the latest mpox infection contracted, if applicable.

(Show if Web) Instructions for single response question

- 1 Between May 2022 and Dec 2022
- 2 Between Jan 2023 and Dec 2023
- 3 Between Jan 2024 and Dec 2024
- 4 Between January 2025 to today *(Show if After January 1 2025 (custom: <<today_passed('2025-01-01')>>))*
- 8 Prefer not to answer
- 9 I don't know

B4b *Show if Have had mpox (B4 = 1)*

Where do you think it is likely that you got infected?

(Show if Web) Instructions for single response question

- 1 In Canada
- 2 In the United States
- 3 In Democratic Republic of the Congo (DRC) and/or neighbouring countries (e.g., Burundi, Rwanda, Uganda, and Kenya)
- 4 In Nigeria and other countries of West, Central and East Africa
- 5 Elsewhere (please specify): _____
- 8 Prefer not to answer
- 9 I don't know

Page Health threats

C13

On a scale from 0 = none to 5 = very high, how would you rate the **current** health threat of the following infections to the Canadian population?

(Show if Web) Instructions for table-type question

- 5. Chlamydia *
- 2. Mpox *
- 6. Gonorrhea *
- 4. HIV *
- 7. HPV *

*Levels marked with * are randomized*

- 0 0 - None
- 1 1 - Very low
- 2 2 - Low
- 3 3 - Moderate
- 4 4 - High
- 5 5 - Very high
- 8 I prefer not to answer
- 9 I don't know

Section Immunization Coverage

C18, C2, C1, C3, C3a, C3b, C3c

Page Mpox Immunization

C18

What is your perception of vaccination in general?

(Show if Web) Instructions for single response question

- 3 I am generally opposed to vaccination
- 2 I am generally neither in favor nor opposed to vaccination
- 1 I am generally in favour of vaccination

C2

Have you ever received a smallpox vaccine?

The smallpox vaccine provides protection against mpox. The smallpox vaccine was only offered to Canadians

until 1971. Canadians born in 1972 or later have not been routinely immunized against smallpox. Some countries routinely immunized against smallpox after 1971.

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- .8 I prefer not to answer
- .9 I don't know

C1 *Show if Aware of Mpox (B3 = 1,2,3)*

Are you aware that a vaccine against mpox is currently available in Canada?

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- .8 I prefer not to answer
- .9 I don't know

Page Mpox Immunization *Show if Aware of mpox vaccine (C1 = 1)*

C3

Have you received a vaccine for mpox **since June 2022?**

Imvamune® is the approved vaccine for mpox in Canada. On June 10, 2022, the National Advisory Committee on Immunization (NACI) provided recommendation for the use of Imvamune® against mpox in Canada.

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- .8 I prefer not to answer
- .9 I don't know

C3a *Show if Received mpox vaccine (C3 = 1)*

How many doses of the mpox vaccine have you received since 2022?

(Show if Web) Instructions for single response question

- 1 1 dose

- 2 2 doses
- 3 3 doses or more
- 8 I prefer not to answer
- 9 I don't know

C3b *Show if Received mpox vaccine (C3 = 1)*

When was your latest mpox vaccine dose received?

Please consider the latest dose received, if applicable.

(Show if Web) Instructions for single response question

- 1 Between May 2022 and Dec 2022
- 2 Between Jan 2023 and Dec 2023
- 3 Between Jan 2024 and Dec 2024
- 4 Between January 2025 to today *(Show if After January 1 2025 (custom: <<today_passed('2025-01-01')>>))*
- 8 Prefer not to answer
- 9 I don't know

C3c *Show if Received mpox vaccine (C3 = 1)*

Where did you receive your latest mpox vaccine dose?

(Show if Web) Instructions for single response question

- 1 At a hospital
- 2 At a local public health unit/community health centre/CLSC
- 3 At a sexual health clinic
- 4 At a pop-up vaccination clinic
- 5 At a community clinic
- 6 At a primary care provider (i.e. doctor, nurse practitioner) office
- 7 Another location (please specify): _____
- 8 Prefer not to answer
- 9 I don't know

Section Immunization Coverage continued

C5a, C6, C7, C9, C10a, C12b, C16, C17, S3Int, S3, S4a, S4b, C14a, C14b

Page Obstacles to Getting Vaccinated *Show if Yes or no mpox vaccine and not anti vaccine
OR Mpox vaccinated and anti vaccine (((C3 = 0,1) AND (C18 = 1,2)) OR ((C3 = 1) AND (C18 = 3)))*

C5a

What obstacles, if any, have made it difficult to get vaccinated against mpox?

(Show if Web) Select all that apply

- 11 I am not eligible in my province or territory
- 12 I have not encountered any obstacles *(Exclusive)*
- 1 Not knowing where I could go to get vaccinated *
- 2 Eligibility for mpox vaccine was unclear to me *
- 13 Difficulty getting access to the vaccine (i.e., access to an appt, a health care provider, a vaccination site, etc.) *
- 14 Lack of welcoming and culturally safe facilities for 2SLGBTQ+ *
- 5 The vaccine was unavailable in my area when I wanted/needed it *
- 7 I am worried about others finding out I got vaccinated *
- 8 Language barriers (e.g., information not in my preferred language) *
- 9 Other
- 8 I prefer not to answer
- 9 I don't know

*Levels marked with * are randomized*

C6

Are you or were you hesitant to get vaccinated against **mpox**?

(Show if Web) Instructions for single response question

- 1 Yes, I **am** hesitant to get vaccinated against mpox
- 2 Yes, I **was** hesitant to get vaccinated against mpox
- 0 No
- 8 I prefer not to answer
- 9 I don't know

C7 Show if Not vaccinated for mpox AND opposed to vaccines OR hesitant to vaccinate (((C3 = 0) AND (C18 = 3)) OR (C6 = 1,2))

For what reason(s) have you hesitated or refused to get vaccinated against mpox?

(Show if Web) Select all that apply

- 1 Not recommended by my health care provider *
- 2 I don't think the mpox vaccine is safe *
- 3 I don't think the mpox vaccine works *
- 4 I don't trust vaccination in general *
- 5 I don't see the need for it because the health risks of mpox are low *
- 6 I don't think I'm at risk of getting mpox *
- 7 I had or I know someone who had a bad experience or reaction to a previous vaccination *
- 13 I was vaccinated but got infected, and I believe the mpox vaccine is unnecessary *
- 8 Philosophical, religious, or spiritual reasons *
- 9 Experienced or concerned about discrimination in health care settings *
- 10 I am worried about others finding out I got vaccinated for mpox (i.e. anonymity) *
- 11 I have had too many vaccines recently and do not want to get vaccinated *
- 14 I heard or read negative media (e.g., on social media, blogs, forums) about the mpox vaccine *
- 12 Other
- 8 I prefer not to answer
- 9 I don't know

Levels marked with * are randomized

Page Intention to Vaccinate

C9 Show if Received mpox vaccine or DK PNA (C3 = 1, I prefer not to answer, I don't know)

How likely are you to get vaccinated against mpox **again**?

(Show if Web) Instructions for single response question

- 1 Very likely
- 2 Somewhat likely
- 3 Somewhat unlikely
- 4 Very unlikely
- 8 I prefer not to answer
- 9 I don't know

C10a Show if Not aware of mpox OR Not aware of vaccine OR DK PNA ((B3 = 4,I prefer not to answer,I don't know) OR (C1 = 0,I prefer not to answer,I don't know))

On June 10, 2022, the National Advisory Committee on Immunization (NACI) provided recommendations for the use of Imvamune® against mpox in Canada for high-risk groups. The vaccine requires two doses, given at least 28 days apart, for optimal protection. According to NACI guidance, vaccination is not recommended for individuals with previous or active mpox infection.

How likely are you to get vaccinated against mpox **in the future**?

(Show if Web) Instructions for single response question

- 1 Very likely
- 2 Somewhat likely
- 3 Somewhat unlikely
- 4 Very unlikely
- 8 I prefer not to answer
- 9 I don't know

Page Knowledge, Attitudes and Beliefs

C12b Show if Received mpox vaccine (C3 = 1)

Prior to receiving the mpox vaccine, how concerned were you about getting mpox?

(Show if Web) Instructions for single response question

- 1 Not at all concerned
- 2 A little concerned
- 3 Moderately concerned
- 4 Very concerned
- 8 I prefer not to answer
- 9 I don't know

C16

Which of the following sources of information would you be most likely to consult in order to find information on the **mpox vaccine (Imvamune®)**?

(Show if Web) Select all that apply

- 1 Health care providers *
- 2 Family/friends *
- 3 My local public health unit/clinic (including their websites) *

- 4 Ministry of Health within my province or territory (including their websites) *
- 5 Public Health Agency of Canada or Health Canada (including their websites) *
- 6 2SLGBTQI+ organizations *
- 14 Sexual health service provider *
- 7 Scientific publications, journals *
- 8 National Advisory Committee on Immunization (NACI) *
- 9 International health authorities (e.g., World Health Organization (WHO)) *
- 10 News or media *
- 11 Social media (e.g., Facebook, Twitter) *
- 12 Other
- 13 I do not seek information on immunization (*Exclusive*)
- 8 I prefer not to answer
- 9 I don't know

*Levels marked with * are randomized*

C17

Canadians have many viewpoints on approved vaccines and their effectiveness or necessity.

To the best of your knowledge, please rate the extent to which you agree or disagree with the following statements:

(Show if Web) Instructions for table-type question

1. Vaccines are an effective way to protect my partner, family or community against mpox. *
2. The mpox vaccine is effective in providing protection against mpox when given before exposure to a probable or confirmed case of mpox. *
3. The mpox vaccine is effective in providing protection against mpox when given after exposure to a probable or confirmed case of mpox, and before the development of any symptoms. *
4. I feel confident that I can protect myself from getting mpox by getting the vaccine. *
5. In general, vaccines are safe. *
6. In general, vaccines are effective. *

*Levels marked with * are randomized*

- 1 Strongly agree
- 2 Somewhat agree
- 3 Somewhat disagree
- 4 Strongly disagree
- 8 I prefer not to answer
- 9 I don't know

Page Sexual Identity

S3Int

To align with Canada's overall approach to public awareness and sensitivity towards 2SLGBTQI+ communities, the following questions are about your sexual orientation and sexual activities. Though, you may skip the questions that you do not feel comfortable answering by clicking "Prefer not to answer", where applicable.

Why are we asking about sexual orientation?

There continues to be a disproportionate amount of cases of Mpox in the 2SLGBTQI+ community. For analysis and to better serve these communities, these questions are important for analysis purposes. We would like to acknowledge that being part of this community does not in itself make someone more at risk of contracting the virus.

(Show if Web) Select the next button to continue.

S3

What is your sexual orientation?

Sexual orientation refers to how a person describes their sexuality.

(Show if Web) Instructions for single response question

- 1 Gay
- 2 Lesbian
- 3 Bisexual or Pansexual
- 4 Heterosexual ("straight")
- 5 Other sexual orientation (please specify): _____
- 8 I prefer not to answer

S4a *Show if Heterosexual OR Other sexual orientation (S3 = 4,5)*

In the **past 12 months**, have you had a sexual experience with a person of the same sex?

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- 8 I prefer not to answer

S4b Show if Not Heterosexual OR Same sex experience ((S3 = 1,2,3,5,I prefer not to answer) OR (S4a = 1))

For the following question, please select the most accurate response option.

In the **past 12 months**, my sexual partner(s) was / have been:

(Show if Web) Instructions for single response question

- 1 Exclusively men
- 2 Exclusively women
- 3 Both men and women
- 4 Non-binary persons
- 5 None of the above
- 8 I prefer not to answer

C14a

The next set of questions is about your sexual behaviour. Please remember that your answers are strictly confidential.

In the **past 12 months**, how many sexual partners have you had?

(Show if Web) Please consider any partner(s) you have engaged in vaginal, anal or oral sex with. If you have not had any sexual partners in the past 12 months, please type 0. <<numericinstruction>>

Minimum: 0, Maximum: 99

_____ number of sexual partners

- 8 I prefer not to answer
- 9 I don't know

C14b Show if Aware of Mpox (B3 = 1,2,3)

People may have changed some of their practices in response to the mpox outbreak which began in 2022 in Canada.

Sexual behaviour refers to the sexual activities in which a person engages.

In the **past 12 months**, how have the following things changed for you, if at all?

(Show if Web) Instructions for table-type question

1. Number of sex partners * *(Show if 1 or more partners (C14a >= 1))*
2. Having group sex (defined as multiple multiple sex partners at once or over a short period) *
(Show if More than 1 partner (C14a > 1))
9. Condomless sex * *(Show if 1 or more partners (C14a >= 1))*

4. One-time sexual encounters * (*Show if 1 or more partners (C14a >= 1)*)
5. Attending sex-on-premises venues or events (e.g., sex parties, bath houses) *
6. Sex with partners met through dating apps or at sex venues *
7. Chemsex (illicit drug use before or during sexual intercourse)
8. Binge drinking (excessive drinking on one occasion)

*Levels marked with * are randomized*

- 1 Increased
- 2 Decreased
- 3 No change
- 4 Not applicable - never engaged
- 8 I prefer not to answer
- 9 I don't know

Section Sociodemographics

A1, A2, A3, A4, A4a, A5, A5a, A6

Page Demographics

A1

We would like to ask you a few questions about your general background. We acknowledge that some of these questions may result in uncomfortable feelings.

What was your sex at birth?

(Show if Web) Instructions for single response question

- 1 Male
- 2 Female

A2

What is the highest level of formal education you have completed?

(Show if Web) Instructions for single response question

- 1 Less than a high school diploma or equivalent
- 2 High school diploma or equivalent
- 3 Registered apprenticeship or other trade certificate or diploma
- 4 College/CEGEP or other non-university certificate or diploma
- 5 University certificate or diploma below bachelor's level
- 6 University – bachelor's degree or equivalent

- 7 University – post-graduate degree above bachelor’s level or equivalent
- 8 Other (please specify): _____
- 8 I prefer not to answer
- 9 I don't know

A3

Please indicate your total household income, before taxes and deductions, for the year ending December 31, 2023. Your total household income consists of the total amount of money earned by all household members.

(Show if Web) Instructions for single response question

- 1 Under \$20,000
- 2 \$20,000 to just under \$40,000
- 3 \$40,000 to just under \$60,000
- 4 \$60,000 to just under \$80,000
- 5 \$80,000 to just under \$100,000
- 6 \$100,000 to just under \$150,000
- 7 \$150,000 and above
- 8 I prefer not to answer
- 9 I don't know

A4

Our racial and ethnic identities may shape the communities we belong to and how we experience or are treated by different individuals and institutions.

Which of the following best describes the racial or ethnic community that you belong to? We recognize this list of racial or ethnic identifiers may not exactly match how you would describe yourself.

(Show if Web) Please select all that apply to you.

- 1 Black (African, Afro-Caribbean, African descent)
- 2 East/Southeast Asian (e.g. Chinese, Korean, Japanese, Taiwanese, Filipino, Vietnamese, Cambodian, Thai, Indonesian, other East/Southeast Asian descent)
- 3 Indigenous (First Nations, Métis and/or Inuit)
- 4 Latino/Latina (e.g. Latin American, Hispanic descent)
- 5 Middle Eastern and North African (e.g. Arab, Algerian, Egyptian, West Asian descent (e.g. Iranian, Israeli, Lebanese, Turkish, Kurdish, etc.)
- 6 South Asian (e.g., Afghan, Indian, Pakistani, Bangladeshi, Sri Lankan, etc.)
- 7 White (e.g. European, Caucasian, etc.)
- 8 Other (please specify): _____

-8 I prefer not to answer

A4a *Show if Is Indigenous (A4_3 = 1)*

Do you identify as First Nations, Métis and/or Inuit?

(Show if Web) Select all that apply

- 1 First Nations
- 2 Métis
- 3 Inuit
- 8 I prefer not to answer

A5

Are you currently employed as a health care worker? Please include paid and unpaid/volunteer work.

This includes employment as a physician, nurse, community health worker, pharmacist, laboratory worker, mental health professional, first responder/paramedic, health care administration, occupational or physical therapist, traditional healer, employee or staff who works, studies, or volunteers in hospitals, long-term care, nursing home, and community settings, etc.

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- 8 I prefer not to answer

A5a

Individuals may be immunocompromised due to a condition they are born with, an illness (e.g.; cancer) or medications that suppress immune function.

To the best of your knowledge, are you immunocompromised?

(Show if Web) Instructions for single response question

- 1 Yes
- 0 No
- 8 I prefer not to answer
- 9 I don't know

A6

Do you live in an urban or rural area?

An urban area is a city, town or village with a population of 1,000 people or more, while a rural area is any other area of lower population.

(Show if Web) Instructions for single response question

- 1 Urban
- 2 Rural
- 8 I prefer not to answer
- .9 I don't know

Section Survey End *Show if isWeb (custom: <<current_mode_is("web")>>)*

WebEndTCH, WebEndIndigenous

Page End_main

WebEndTCH *Show if Not Indigenous NOT (A4_3 = 1)*

This is the end of the survey. On behalf of the Public Health Agency of Canada, we would like to thank you for participating in this survey. Your responses will provide invaluable and insightful information about public health and sexual health topics in Canada.

GET HELP HERE: MENTAL HEATH SUPPORT (<https://www.canada.ca/en/public-health/campaigns/get-help-here.html>) offers free mental health and substance use support as well as online mental health resources.

For further information about the link between mental and sexual health, please refer to: <https://www.news-medical.net/health/Integrating-Mental-and-Sexual-Health.aspx> (<https://www.news-medical.net/health/Integrating-Mental-and-Sexual-Health.aspx>)

Status Code: -1

WebEndIndigenous *Show if Is Indigenous (A4_3 = 1)*

This is the end of the survey. On behalf of the Public Health Agency of Canada, we would like to thank you for your participation. Your responses will provide valuable and insightful information about immunization in Indigenous communities across Canada.

The First Peoples Wellness Circle (FPWC) is a national not-for-profit corporation governed and managed by Indigenous Leaders and exists to improve the lives of Canada's First Peoples by addressing healing, wellness and other mental health challenges. Call 1-833-311-FPWC (3792)

Hope for Wellness Helpline (<https://www.hopeforwellness.ca/> (opens in a new window) (<https://www.hopeforwellness.ca/>)) is available 24/7 to all Indigenous people across Canada. Telephone and online

counselling are available in English and French. Additional languages can be requested.

Call the toll-free Help Line: 1-855-242-3310 or connect to the online chat at [hopeforwellness.ca](https://www.hopeforwellness.ca)

GET HELP HERE: MENTAL HEALTH SUPPORT (<https://www.canada.ca/en/public-health/campaigns/get-help-here.html>) offers free mental health and substance use support as well as online mental health resources.

For further information about the link between mental and sexual health, please refer to: <https://www.news-medical.net/health/Integrating-Mental-and-Sexual-Health.aspx> (<https://www.news-medical.net/health/Integrating-Mental-and-Sexual-Health.aspx>)

Status Code: -1