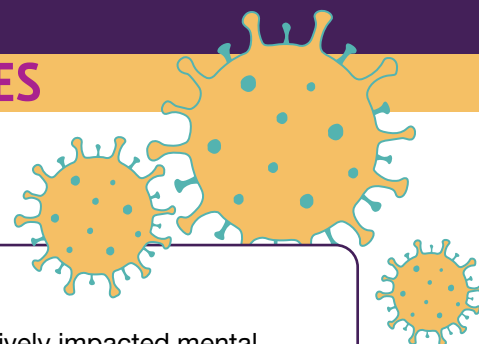


Mental Health

EXAMINING THE SOCIETAL CONSEQUENCES OF THE COVID-19 PANDEMIC



Key Findings

- The COVID-19 pandemic and related response measures have negatively impacted mental health and may lead to lasting poor mental health and mental illness for some people.
- In a survey conducted by Statistics Canada, over half of respondents age 15+ in BC reported experiencing “somewhat worse” or “much worse” mental health due to COVID-19 and related measures. Females and individuals age 15–24 and 25–44 were more likely to report worsened mental health.
- Experiences of greater stress and worsened mental health were reported more among individuals living with disabilities, people with a pre-existing mental health issue, gender-diverse individuals, recent immigrants, and individuals earning lower levels of income.

Situation

The COVID-19 pandemic and related response measures introduced in BC to curb the spread of COVID-19 have contributed to worsened mental health and increased stress. People are reporting concerns about immediate health impacts of COVID-19 (e.g. fear of infection), dying or the death of family members from COVID-19, uncertainty regarding the future, reduced or lost employment and/or income, and increased childcare responsibilities.^{1,2} Physical distancing, travel restrictions, and other measures have disrupted social networks and social supports, and increased social isolation.³

Background

Pandemics and other large-scale emergencies can negatively affect mental health both during the event and long after.^{3,4} *Mental health* refers to a “state of well-being in which an individual realizes his or her own abilities, can cope with the normal stresses of life, can work productively, and is able to make a contribution to their community.”⁵

Specific stressors or demands can contribute to poor mental health. While this is usually temporary, it can be permanent.⁶ In contrast, *mental illness* refers to a health condition that challenges a person’s ability to function due to persistent and intense disturbances in thoughts, feelings, and perceptions.^{7,8}

Mental health and mental illness are related but distinct concepts.⁹ A person may have poor mental health, sometimes known as “languishing” (i.e. low levels of well-being and functioning), but not have a mental illness.^{9,10} Alternatively, a person may have good mental health, sometimes known as ‘flourishing’ (i.e. elevated well-being, positive feelings, and functioning well), but be living with a mental illness. Both mental health and mental illness exist along a continuum and both can change over time.

While it is normal for individuals to experience stress in response to changes in circumstances and pressures, severe and/or long-term stress contributes to poor mental health, which increases the risk of developing mental illness and/or physical health problems.¹¹



Groups at higher risk for experiencing poorer mental health during the COVID-19 pandemic include:^{4,12,13,14}

- Older adults already struggling with isolation,
- Frontline health care workers,
- People at higher risk of contracting or at risk of experiencing severe symptoms of COVID-19,
- Those who already face marginalization and social exclusion,
- People in vulnerable situations or experiencing concentrated stressors (i.e., socioeconomic inequities, family violence, children in care),
- Children and youth disconnected from schools and supports, and
- Individuals with pre-existing mental illness, especially if access to mental health services is reduced.

Protective health behaviours that build resilience have decreased during COVID-19, particularly for children and youth (e.g., physical activity).¹⁵ At the same time, behavioural risk factors (e.g., excess internet and social media use), which are linked to mental distress in youth, have increased.¹⁶

Findings

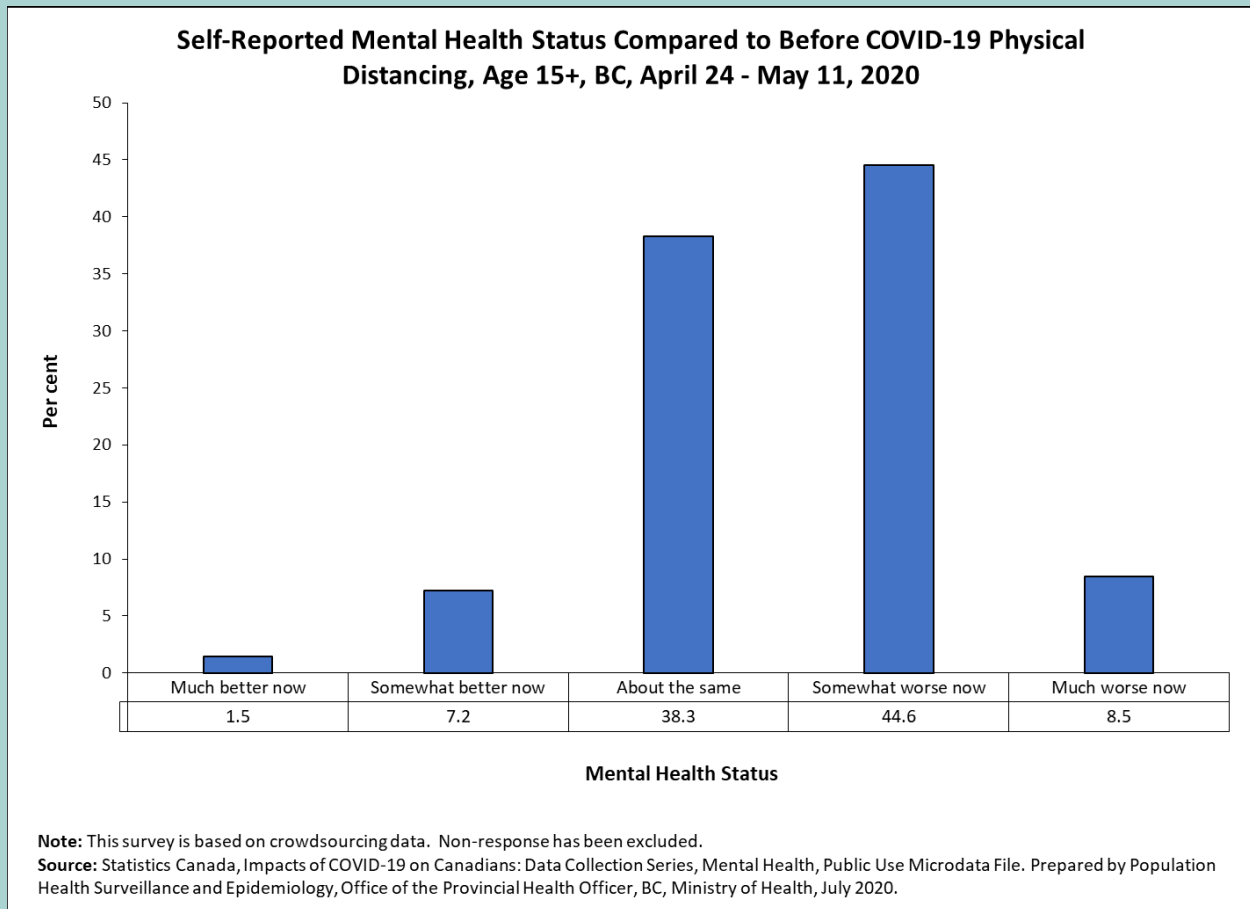
A survey of over 50,000 individuals in the UK one month into the COVID-19 response measures found that the proportion of respondents reporting substantial levels of mental distress rose from 19 per cent in 2018/19 up to 27 per cent in April 2020. The study found that increases in mental distress were reported the most among younger people (age 18–34), women, and people living with young children.² A study in Spain also found that people living with children reported higher levels of mental distress during the COVID-19 pandemic.¹³

Across Canada there is also evidence of worsened mental health since COVID-19 began. For example, there has been a substantial increase in calls to mental health crisis lines since the onset of the pandemic. Crisis Services Canada reported a 30–50 per cent increase in call volume for crisis or mental health support.¹⁷ Crisis lines reported additional operating expenses and the inability to

continually retain enough staff to respond to the increased call volume.¹⁷

In a national longitudinal survey by the Canadian Mental Health Association and University of British Columbia, 42 per cent of BC respondents reported their mental health deteriorated during the COVID-19 pandemic. This includes 60 per cent of those aged 18–24 years (compared to 21 per cent of those ages 75+), 45 per cent of women (compared to 34 per cent of men), and 61 per cent of unemployed individuals.¹⁸ Worsening mental health was reported by 62 per cent of those with a pre-existing mental health issue, 50 per cent of those with a disability, 54 per cent of LGBTQ2S respondents, and 50 per cent of respondents with children under 18. Stressors identified by parents/caregivers with children under age 18 included: finances (48 per cent), job loss (36 per cent), and having enough food to meet their family's needs (27 per cent). Parents/caregivers were 1.5–2 times more likely to report increased use of alcohol, fear of domestic violence, and suicidal thoughts.¹⁹ Of Canadians reporting a mental health concern in this survey, 48 per cent felt they were not in need of help, 22 per cent didn't know resources existed, 21 per cent didn't believe resources would be helpful, and 18 per cent preferred in-person supports.¹⁸

FIGURE 1



Figures 1 to 3 present data from national sources, focusing on data for BC respondents. See Appendix A for more information about data sources and methodology.

As shown in Figure 1, in a Statistics Canada survey that collected data between April 24, 2020, and May 11, 2020, over half of respondents age 15 and up in BC reported experiencing worsened mental health compared to before the COVID-19 response measure of physical distancing.

FIGURE 2

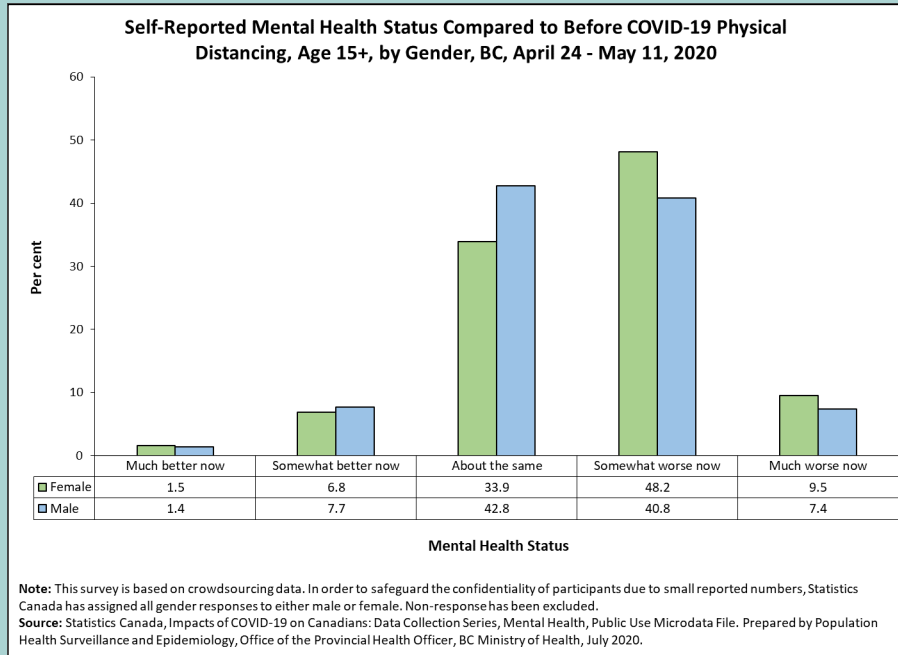
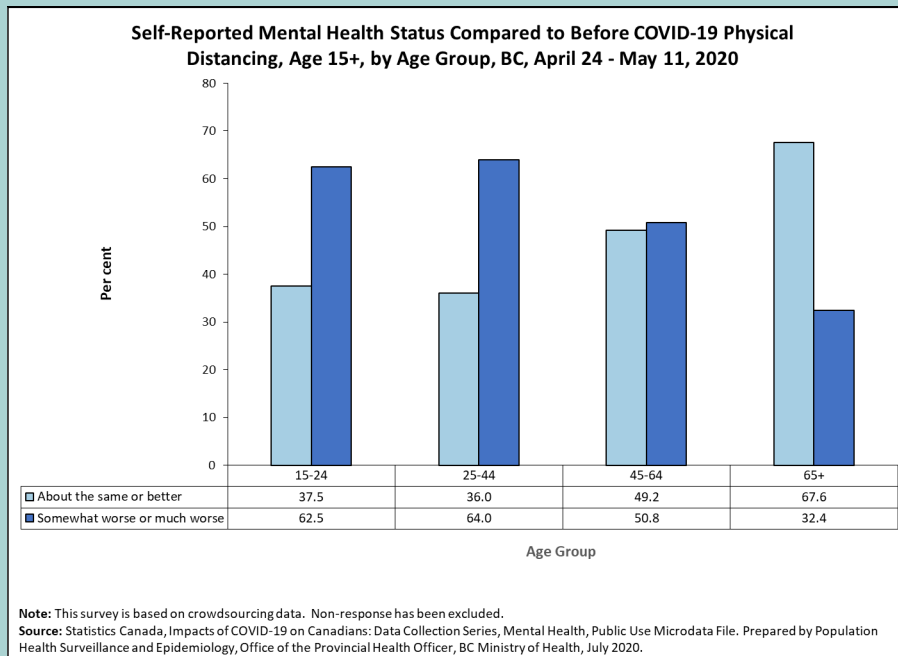
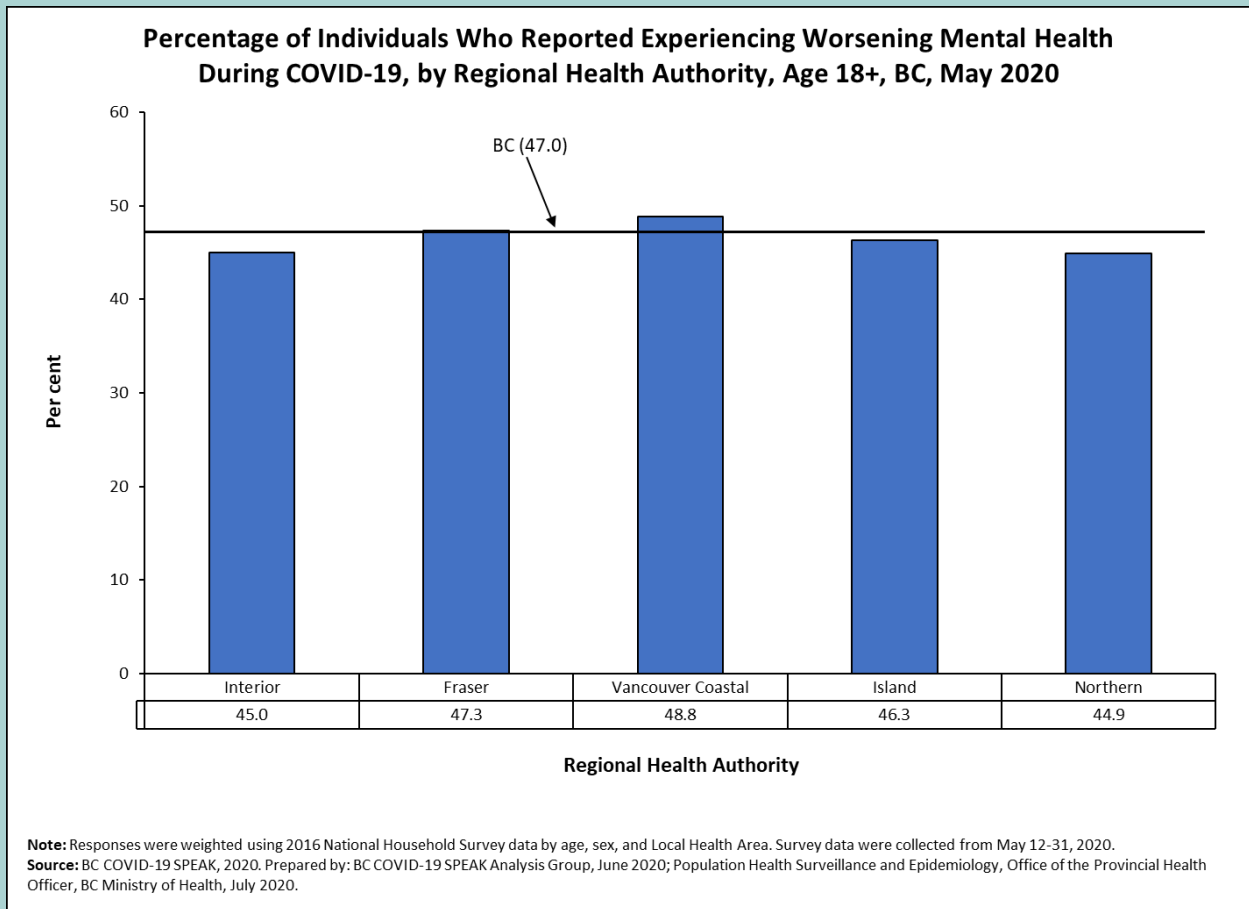


FIGURE 3



Figures 2 and 3 present the same Statistics Canada survey using BC data to assess impacts with analyses by gender and by age. Figure 2 shows that female respondents in BC were more likely to report mental health as “somewhat worse” or “much worse” compared to male respondents. Male respondents were more likely than females to report that their mental health was “about the same” (42.8 per cent compared to 33.9 per cent, respectively). Figure 3 shows that a greater proportion of younger respondents reported worsened mental health, specifically those age 15–24 and 25–44.

FIGURE 4



The following seven figures present results from the BC COVID-19 SPEAK Survey, including analyses of worsening mental health and/or stress, by regional health authority (Figure 4), age group (Figure 5), household income (Figure 6), education level (Figure 7), disability (Figure 8), and racialized group (Figure 9). BC COVID-19 SPEAK Survey analyses by sex and gender are forthcoming and will be included in future reports.

Figure 4 shows that nearly half of survey respondents reported worsening mental health during COVID-19, with a provincial average of 47.0 per cent reporting this, and only slight variation between regions.

FIGURE 5

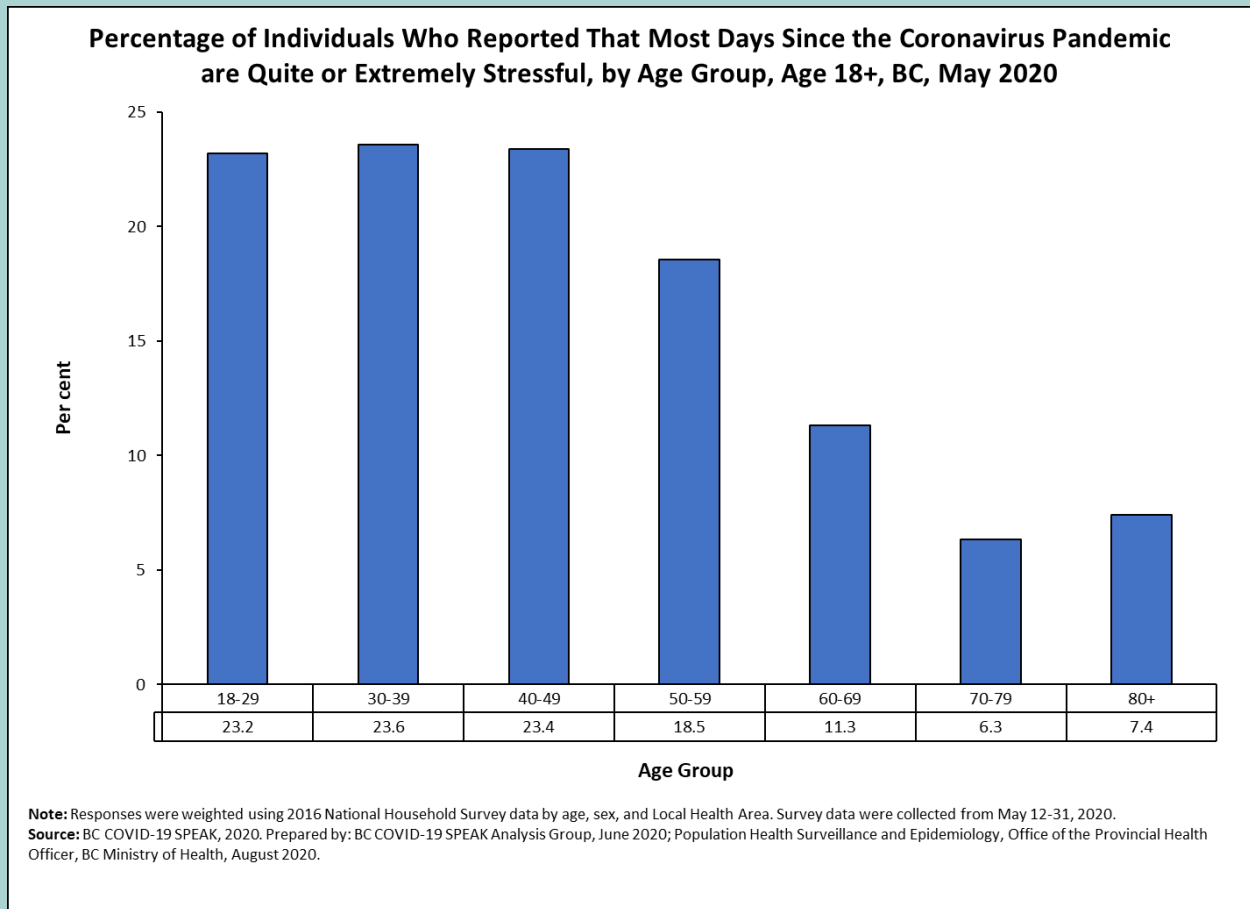


Figure 5 shows the percentage of individuals who reported that they have been “quite” or “extremely” stressed since the COVID-19 pandemic began, based on age. It shows that a greater proportion of younger respondents (those between ages 18 to 49) reported feeling quite/extremely stressed. This may reflect the impact of suspension of in-class learning and physical distancing on youth, young adults, and on parents/caregivers of children and youth, as well socioeconomic and employment impacts for young adults, parents, and caregivers.

FIGURE 6

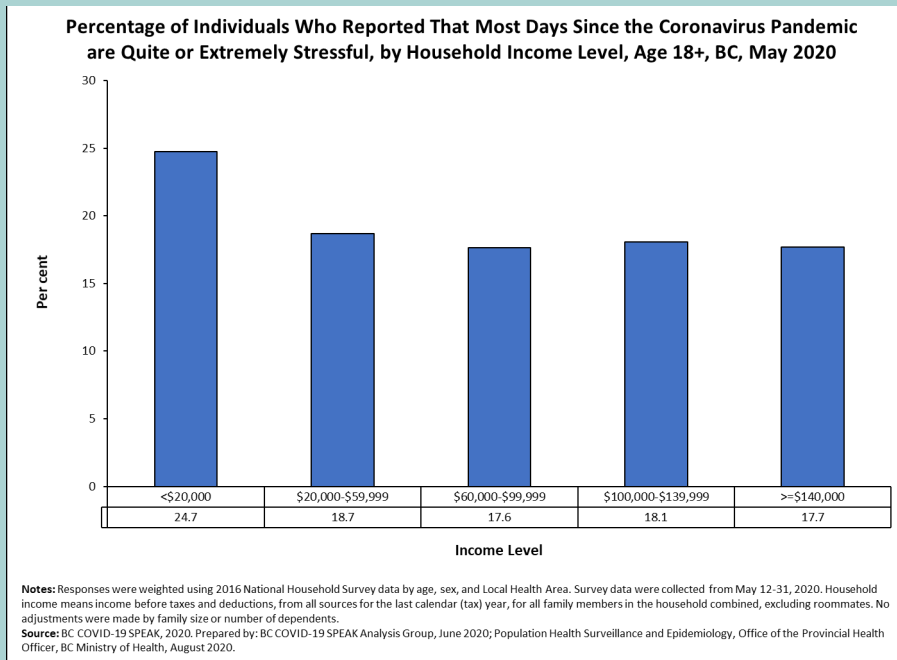


FIGURE 7

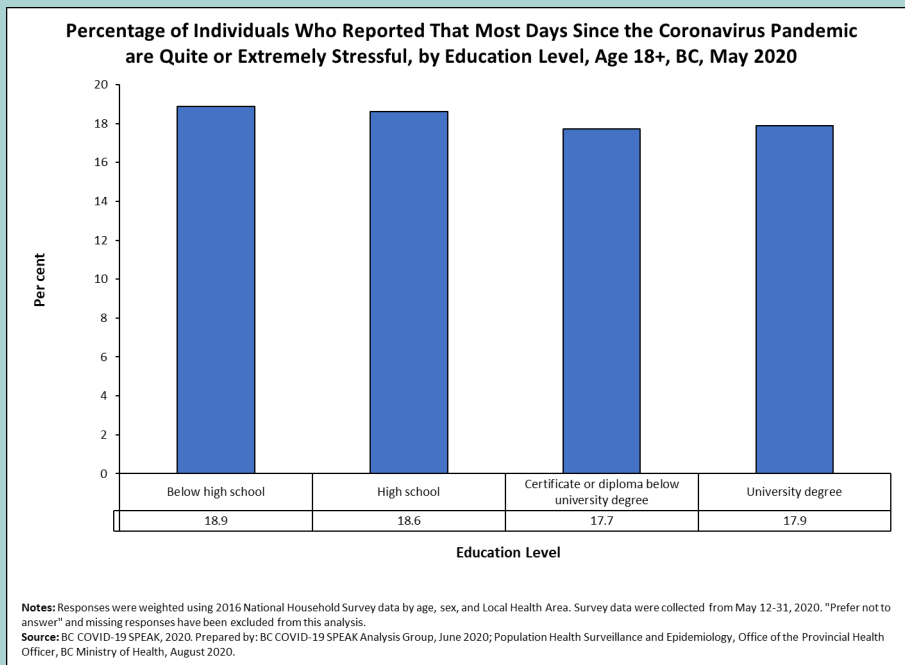


Figure 6 shows that British Columbians who reported household income levels in the lowest category (<\$20,000) were more likely to report being “quite” or “extremely” stressed since the pandemic. Other than the lowest income category, household income level does not clearly link to high levels of stress reported. Figure 7 shows that high levels of stress since the pandemic were reported across education levels with little variation.

FIGURE 8

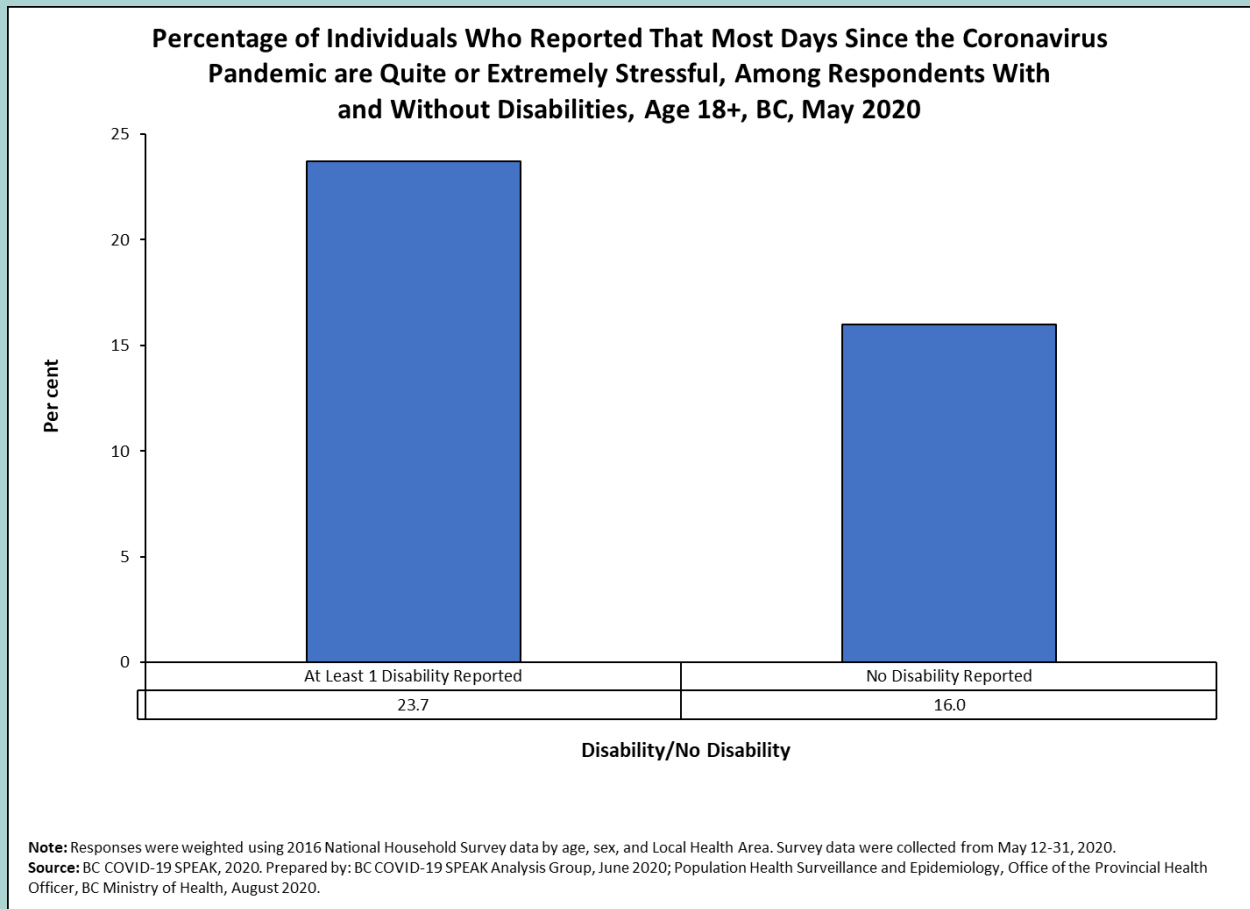


Figure 8 presents responses to the BC COVID-19 SPEAK Survey regarding stress levels since the beginning of the pandemic, based on whether respondents had one or more disabilities. It shows that individuals with at least one disability were more likely to report being “quite” or “extremely” stressed compared with individuals who did not report any disability (23.7 per cent compared to 16.0 per cent). This finding may reflect many complexities navigating the pandemic for those with one or more disability. People with disabilities may have reduced ability to access health and other essential services (e.g., medical appointments, obtaining groceries), difficulty using virtual care and service options, have concerns about ability to adhere to response measures or stay safe (e.g., physical distancing, avoiding high-touch areas), or be at increased risk of contracting or having more serious health outcomes if they contract COVID-19 due to other underlying health conditions.

FIGURE 9

NOTE TO READER: Revisions to this chart are forthcoming, to revisit categorization of racialized groups in analyses

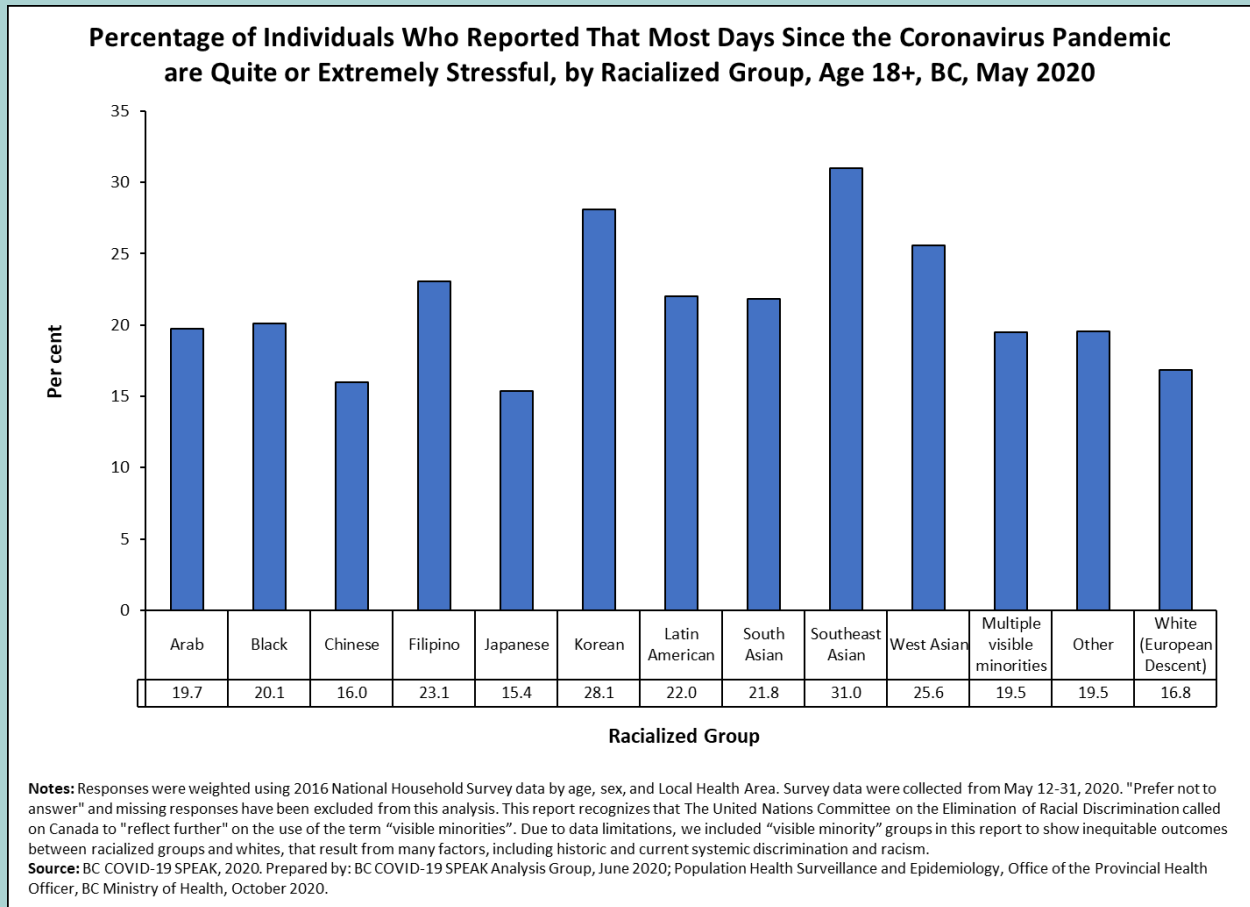


Figure 9 shows analyses of BC COVID-19 SPEAK Survey data indicating that some racialized groups in BC reported higher percentages of feeling “quite” stressed or “extremely” stressed since the pandemic. The highest proportions are reported among Southeast Asian (31.0 per cent), Korean (28.1 per cent), West Asian (25.6 per cent) and Filipino (23.1 per cent) respondents. Reduced ability to engage in social and cultural gatherings as well as socioeconomic impacts may be a contributing factor to feelings of increased stress across all racialized groups in BC.

Equity Considerations

Risk factors at the individual, family, and societal levels may result in disproportionate mental health impacts on some groups.

- Statistics Canada found that gender-diverse people reported worse mental health than people identifying as male or female during the COVID-19 pandemic.²⁰
- COVID-19 response measures may cause additional challenges for individuals with disabilities because more than a quarter (28 per cent) live alone and require outside support.²¹ In addition, one in five Canadians living with disabilities reported they did not use the internet,²¹ which can limit access to virtual mental health services during the pandemic.
- Parents of children with disabilities in Canada were more likely to report being very or extremely concerned for their children's mental health during the pandemic compared to parents of children without disabilities (60 per cent compared to 43 per cent).²²
- Recent immigrants (five years or less since admission to Canada) were more likely to rate their mental health as fair or poor (28 per cent) since the introduction of COVID-19 response measures compared to more established immigrants (20 per cent) and Canadian-born participants (24 per cent).²³ This may be a shift related to COVID-19 response measures because previous research suggests that self-perceived mental health of immigrants is typically better upon arrival in Canada and decreases over time.²⁴

Indigenous Peoples and Reconciliation

The mental health and wellness of Indigenous peoples has been adversely impacted by past and present colonialism, which has deliberately undermined the cultural practices that are central to holistic wellness and community resilience. The stresses of public health restrictions were layered onto the cumulative stresses of intergenerational trauma, manufactured poverty and pervasive racism and discrimination. Despite the cumulative impacts of these stresses, Indigenous peoples remain strong and resilient and continue to assert that their inherent rights must be respected and upheld.

Within the Examining the Societal Consequences Project, the stories of Indigenous peoples' experiences of mental health during the COVID-19 pandemic are being explored in a report on this topic that is being prepared in collaboration with Indigenous partner organizations (see the "Indigenous Health and Wellness" tab on the Examining the Societal Consequences website to access these reports).

Actions Initiated or Planned to Address Unintended Consequence

- The Province is providing \$5 million to expand existing mental health programs and services and launch new services to provide support for people of all ages during COVID-19.²⁵ The funding will also provide greater access to mental health supports for Indigenous, rural, and remote communities, and individuals with pre-existing mental health conditions.²⁵
- Enhanced virtual services are now available in the province to help people with mental health needs arising from the COVID-19 pandemic. See Appendix B for a list of available virtual mental health services.
- In September 2019, the Province announced \$8.87 million would be provided over three years to improve students' mental health through wellness supports and programs.²⁶ On September 2, 2020, the Province added \$2 million for school-based wellness programs and supports.²⁷
- There is research planned and/or underway to better understand the impacts on mental health in BC and Canada from a number of research teams. Research will focus on various groups, including Indigenous peoples, children, youth, families, older adults, sexual minorities and gender diverse people, vulnerable populations, health care workers, employees, Asian-Canadians, and men. See Appendix C for a more detailed list of planned and/or underway research.

Considerations for Further Action

1. Foster positive mental health in individuals, families, and communities during COVID-19.²⁸
 - Provide evidence-based information for individuals, families, and communities to promote mental health in places such as in the home, schools, workplaces, and care facilities.
 - Actively promote protective health behaviours (i.e. getting enough sleep, physical activity, reducing screen time, stress management) that are important for active coping and are affordable, accessible, and within current pandemic response restrictions.
 - Collaborate across sectors and partners to increase support for determinants of mental health, including factors that foster mental health resilience.
2. Ensure early identification of mental health issues and timely access to mental health services.
 - Increase access to early screening and identification for those at risk.
 - Increase awareness of and provide access to timely mental health support services, including crisis support, as well as virtual care.
 - Increase availability of training and mental health consultation supports for care providers (such as primary care) across settings, including rural and remote communities.
3. Monitor mental health status as the pandemic continues, particularly among females, younger age groups, and racialized populations.
4. Develop a comprehensive mental health strategy for BC, including monitoring/surveillance, expanding prevention initiatives, access to treatment, and addressing adverse conditions.
5. Investigate causes and propose solutions to address significant differences between men and women for self-reported mental health.

Appendix A: Data methodology notes

1. Charts provided by Population Health Surveillance and Epidemiology, Office of the Provincial Health Officer.

For questions contact: HLTH.PHSE@gov.bc.ca.

2. Statistics Canada Survey on the Impacts of COVID-19 on Canadians

The Statistics Canada surveys on the Impacts of COVID-19 on Canadians are designed to assess the quality and viability of a more timely collection model using willing participants (voluntary) and web-only collection. In the context of this product, the term *crowdsourcing* refers to the process of collecting information via an online questionnaire. The crowdsourcing data was collected through a completely non-probabilistic approach which does not involve a random selection of respondents like other traditional Statistics Canada surveys. Consequently, results pertain only to the participants and cannot be used to draw conclusions about the larger population of Canadians. Standardized benchmarking factors have been applied to compensate for the over/underrepresentation of the participants resulting from the use of crowdsourcing data.

For this crowdsourcing initiative, a three-category gender variable was derived. Write-in responses to the gender questions were coded to “Male”, “Female”, or “Gender diverse” if the participant provided a valid write-in response. Participants with a missing or an invalid write-in response were considered out-of-scope and were removed from the file. While the three-category gender variable is retained on the analytical master file, a derived binary variable for gender was also created for inclusion on the Public Use Microdata File (PUMF). This was done in order to match available control totals for benchmarking, as well as to safeguard the confidentiality of participants due to the small number of write-in responses. This binary gender variable was derived by randomly assigning responses of “Gender diverse” to either “Male” or “Female”. Figures 1 to 3 of this report is based on the PUMF data and therefore reports on the derived binary variable for gender.

3. BCCDC COVID-19 SPEAK Survey

Survey administration: The BC COVID-19 SPEAK Survey was primarily an online survey administered from May 12, 2020 to May 31, 2020 across British Columbia. A call centre was also created to support individuals who wished to take the survey with assistance. The survey was available in English and Simplified Chinese (online), with language guides in downloadable electronic format available for nine other languages (Arabic, American Sign Language, Farsi, French, Korean, Punjabi, Spanish, Traditional Chinese and Vietnamese). All other languages were available through the call centre from PHSA Provincial Language Services.

Sampling: The target population for the survey was residents of British Columbia who were 18 years of age or older. In order to achieve a large and representative sample, a response target of 2% of the urban population and 4% for rural/remote communities were set as determined by the Community Health Service Area (CHSA) density designation. Targets were also established for age, gender, income, education and ethnicity by each geographic area. Progress towards these targets was monitored daily and purposeful promotion and stakeholder outreach was done in order to better reach certain geographies and population demographics. Population targets were surpassed for each Regional Health Authority. However, not all sub-regions or demographic groups by geography did reach their target. Specifically, rural communities, populations with lower education, lower incomes, and some visible minorities were less reached and were prioritized for outreach. The final analytical dataset, which only included surveys where a Health Service Delivery Area geography, age, and gender were assigned and where the respondent must have completed at least 33% of the survey, contained 394,382 responses.

Weighting: Statistical weighting is often used in large surveys to ensure that the sample of collected responses reflects the overall target population. This type of weighting compensates for the fact that certain demographics are less likely to respond to a survey. By establishing detailed socio-demographic targets at the outset for each geographic area of interest within the survey area, it allowed for more focussed participant recruitment with the ultimate benefit of applying smaller weights. The final BC COVID-19 SPEAK Survey sample was weighted using 2016 Canadian Census data by geography (HSDA, LHA, and CHSA) for age, sex, education level, and ethnicity to account for residual differences in sample demographics and to ensure that the sample is as representative as possible of the overall geographic population that is being reported on.

Data Limitations: BC COVID-19 SPEAK Survey is a non-randomized voluntary survey subject to self selection bias among those who choose to respond to the survey. To adjust the sample to the population and enhance representativeness, quota-based sampling by geography and post collection weighting are used. Correction for unknown population characteristics is not possible. This limitation is not unique to non-randomized surveys as self selection bias is apparent in voluntary randomized surveys as well where a significant proportion of those offered to take a survey choose not to participate. Despite attempts for outreach to underrepresented communities and statistical weighting and the creation of multiple points of access, this survey may be limited in its ability to fully reflect the experiences of members of communities unable to complete the survey due to language or access barriers.

Note on disability status: Respondents included in the “At least 1 disability reported” population are those that selected one or more of the following responses to the question “Do you have a permanent or long-term disability? If so please indicate what type (check all that apply)”: Vision; Hearing; Mobility (e.g. difficulty walking); Flexibility (e.g. difficulty bending down and picking up an object); Dexterity (e.g. difficulty in using hands or fingers); Pain-related; Learning (e.g. attention difficulties); Developmental (e.g. autism); Mental health-related (e.g. anxiety disorder); Memory (e.g. frequent episodes of confusion); or Other (please specify).

Appendix B: List of virtual mental health supports

Virtual mental health supports for everyone²⁹

- **BounceBack** – Expanded access to free online, video, and phone-based coaching and skills-building program so that more seniors, adults, and youth who are experiencing low mood, mild to moderate depression, anxiety, stress or worry, can receive care.
- **Virtual counselling services** – Expanded access to virtual community counselling for individuals or groups at low or no cost.
- **Peer support and system navigation** – Expanded access to virtual mentoring and supports by increasing the number of peer support and system navigation workers.
- **Living Life to the Full** – Launched access to free virtual *Living Life to the Full* peer support and practical skills courses for coping with stress, problem solving, and boosting mood. The eight-week course is led by a trained facilitator.
- **B.C. COVID-19 mental health self-assessment tool** – Launched a set of mental health screening self-tests alongside the COVID-19 self-assessment tool.

Virtual support for front-line health-care workers

- **Mobile Response Team (MRT)** – In addition to supporting workers on the front lines of the overdose public health emergency, the MRT provides psychosocial support to front-line health-care workers, including long-term care and community-care workers, who are experiencing mental health issues in response to the pandemic.³⁰
- **Free online mental health first aid (BC Psychological Association)** – New online psychological supports for front-line health-care workers.³¹
- **Online resource hub (Canadian Mental Health Association – BC Division)** – Online resources expanded to include information on psychological and social supports and provide mental health and well-being strategies for front-line workers.²⁹
- **Virtual peer support service (Canadian Mental Health Association – BC Division, SafeCareBC, and other health partners)** – Phone and text-based peer support service that provides confidential support and referrals to other services. Staffed by former long-term care and home support workers.²⁹

Virtual support for community clinicians

- **Compass – Child and Youth Mental Health, BC Children’s Hospital, PHSA** – Virtual service delivered by an interprofessional team (psychiatry, nursing, social work) that provides information and resources to community care providers across BC servicing children and youth with mental health and substance use issues.³²

Virtual mental health supports for youth

- **Foundry Virtual Clinic** – Nine existing virtual Foundry centres are providing virtual walk-in counselling. A new province-wide youth-focused virtual clinic with counselling, peer support, primary care, and family support for young people age 12–24 and their families will be available via voice, video, and chat.³³
- **Kelty Mental Health** – Online BC mental health and substance use information, system navigation, resources, tools and peer support for youth, parents/caregivers, healthcare professionals, and school professionals. Includes new resources for parenting during COVID-19.³⁴

Virtual mental health supports for seniors

- **bc211** – bc211, which is a province-wide information and referral service, matches seniors whose support network has been affected by the COVID-19 pandemic with volunteers.³⁵ This service will take calls from people who would like to volunteer to help seniors in their community with basic needs, including grocery shopping and pharmacy drop-offs and check-ins.

Virtual mental health supports for victims of family or sexual violence

- **VictimLink BC** – Immediate 24/7 crisis support for victims of family or sexual violence is available by phone through VictimLink BC's 24/7 telephone service.³⁶

Appendix C: List of research planned and/or underway

Study Group	Research
General Population (Canada & BC)	<ul style="list-style-type: none"> The Centre for Addiction and Mental Health is conducting multiple waves of research on mental health and substance use among Canadians.³⁷ Emily Jenkins (University of British Columbia) is leading research with the Canadian Mental Health Association on COVID-19 mental health outcomes that will monitor mental health over 12 months (Assessing the Mental Health Impacts of COVID-19: A National Survey). Some results of this study have been highlighted in this report.¹⁹ Statistics Canada conducted a crowdsourcing survey, 'Impacts of COVID-19 on Canadians' (ICC), which included questions on mental health from April 24 to May 11, 2020.³⁸ <p>In addition:</p> <ul style="list-style-type: none"> Topic: Mental Health and Covid-19: Knowledge Synthesis to Support and Promote Mental Wellness and Resilience [general population]; Researcher(s): Joseph Puyat, University of British Columbia; Funding: Canadian Institutes of Health Research. Topic: Measuring Mental Well-being During a Pandemic Study [general population]; Researcher(s): Scott A. Lear, Simon Fraser University; Funding: Researcher's funds. Topic: COVID+PA: Physical activity and well-being during a period of pandemic [general population]; Researcher(s): Guy Faulkner, University of British Columbia; Funding: Unspecified.
Indigenous Peoples	<ul style="list-style-type: none"> Alanaise Goodwill (Simon Fraser University) is conducting research about the impacts of COVID-19 on the mental health of Indigenous communities. Funding: Canadian Institutes of Health Research Operating Grant, Knowledge Synthesis Grant: COVID-19 Rapid Research Funding Opportunity in Mental Health.³⁹
Children & Youth & Families	<ul style="list-style-type: none"> Joint research teams from UBC and the BC Children's Hospital (BCCH) are examining the impacts of COVID-19 and public health measures on the mental health of children and youth.⁴⁰ <p>In addition:</p> <ul style="list-style-type: none"> Topic: Personal Impacts of COVID-19/Coronavirus Study (PICS) [mental health of families and children described as vulnerable]; Researcher(s): S. Evelyn Stewart, University of British Columbia; Funding: Unspecified. Topic: NPW Survey; The Northern Pediatric Wellness (NPW) Survey [child wellness, NHA]; Researcher(s): Kathryn Leccese, University of British Columbia; Funder: Unfunded. Topic: Children's Mental Health: Responding to COVID-19 [children's mental health]; Researcher(s): Charlotte Waddell, Simon Fraser University; Funding: BC Representative for Children and Youth. Topic: Youth Mental Health and Substance Use in the Context of COVID-19 [youth]; Researcher(s): Skye Barbic, University of British Columbia; Funding: Canadian Institutes of Health Research. Topic: Youth Health and COVID-19 Survey; Assessing the impact of the COVID-19 pandemic on social health [young adults, including mental health]; Researcher(s): Rodney Knight, PHC; Funding: Grant – Canadian Institutes of Health Research.
Asian-Canadians	<ul style="list-style-type: none"> Topic: COVID-19 and Mental Health Resources for Asians in Canada [Asian ancestry]; Researcher(s): Fred Chou, University of Victoria; Funding: Faculty of Education COVID-19 Emergency Research Fund.

Study Group	Research
Sexual & Gender Minorities	<ul style="list-style-type: none"> • Topic: Service Provider Perspectives on Tools to Improve Access to Mental Health Supports for Sexual and Gender Minorities [MHSU services for sexual and gender minorities]; Researcher(s): Travis Salway, Simon Fraser University, BC Centre for Disease Control; Funding: BC SUPPORT Unit Fraser Centre, Canadian Institutes of Health Research – Strategy for Patient-Oriented Research – Knowledge Translation Award for Patient Oriented Research.
Health Care Workers	<ul style="list-style-type: none"> • Topic: COVID-19 Impact of General Surgeon Mental Health Survey; Psychological and Workplace-Related Effects [health care workers]; Researcher(s): Morad Hameed, University of British Columbia; Funding: Unfunded. • Topic: COVID-19 Survey: Clinicians’ Quality of Life and Moral Injury During the COVID-19 Pandemic [frontline clinicians and their spouses/partners; including mental health]; Researcher(s): David Barbic, Providence Health Care; Funding: Unfunded.
Men	<ul style="list-style-type: none"> • Topic: COVID-19 Study; Men’s Experiences of the COVID-19 Pandemic [men’s mental health]; Researcher(s): John Ogrodniczuk, University of British Columbia; Funding: Unfunded.
Employees	<ul style="list-style-type: none"> • Morneau Shepell is conducting monthly research on the mental health of Canadians who are employed or were employed in the last six months.⁴¹ Disaggregated data for BC are being reported to the Ministry of Mental Health and Addictions. • Topic: COVID-19 Anxiety: Anxiety and Coping During COVID-19 Pandemic [employees] ‘Organizational bad actors: What happens to them?’; Researcher(s): Sandra Robinson, University of British Columbia Sauder School of Business; Funding: Social Sciences and Humanities Research Council of Canada.

References

- 1 Taylor S. The psychology of pandemics: preparing for the next global outbreak of infectious disease. Cambridge Scholars Publishing. Newcastle upon Tyne: 2019.
- 2 Pierce M, Hope H, Ford T, Hatch S, Hotopf M, John A, et al. Mental health before and during the COVID-19 pandemic: a longitudinal probability sample survey of the UK population. *Lancet Psychiatry*. 2020 Jul 21.
- 3 Reynolds DL, Garay JR, Deamond SL, Moran MK, Gold W, Styra R. Understanding, compliance and psychological impact of the SARS quarantine experience. *Epidemiol Infect*. 2008 Jul;136(7):997-1007.
- 4 United Nations. Policy brief: COVID-19 and the need for action on mental health. New York: United Nations; 2020 May 13 [cited 2020 Aug 26]. Available from: <https://unsdg.un.org/sites/default/files/2020-05/UN-Policy-Brief-COVID-19-and-mental-health.pdf>.
- 5 World Health Organization. Mental health: strengthening our response. Geneva: World Health Organization; [cited 2021 Jan 11]. Available from: <https://www.who.int/news-room/factsheets/detail/mental-health-strengthening-our-response>.
- 6 Ridner S. Psychological distress: a concept analysis. *J Am Nursing*. 2004;45(5):536-545.
- 7 Canadian Mental Health Association. Mental health: what is it, really? [Internet]. Toronto, ON: Canadian Mental Health Association; 2020 Jan 13 [cited 2021 Jun 08]. Available from: https://cmha.ca/blogs/mental-health-what-is-it-really#ftn1https://mdsc.ca/docs/MDSC_Quick_Facts_4th_Edition_EN.pdf.
- 8 Canadian Mental Health Association, Alberta Central Region. What is mental health and mental illness? Red Deer, AB: Canadian Mental Health Association, Alberta Central Region; [cited 2021 May 26]. Available from: <https://reddeer.cmha.ca/wp-content/uploads/2017/04/mental-health-and-mental-illness.pdf>.
- 9 Westerhof GJ, Keyes CL. Mental illness and mental health: the two continua model across the lifespan. *J Adult Dev*. 2010 Jun;17(2):110-119.
- 10 Keyes CL. The mental health continuum: from languishing to flourishing in life. *J Health So. Behav*. 2002 Jun 1:207-22.
- 11 Centre for Addiction and Mental Health. Stress [Internet]. Toronto, ON: Centre for Addiction and Mental Health; [cited 2020 Dec 18]. Available from: <https://www.camh.ca/en/health-info/mental-illness-and-addiction-index/stress>.
- 12 Sistovaris M, Fallon B, Miller S, Birken C, Denburg A, Jenkins J, et al. Child welfare and pandemics [Internet]. Toronto, ON: Policy Bench, Fraser Mustard Institute of Human Development, University of Toronto; 2020 [cited 2020 Dec 24]. Available from: https://cwrp.ca/sites/default/files/publications/Childpercent20Welfarepercent20andpercent20Pandemicspercent20Literaturepercent20Scan_2020percent20ENGLISH.pdf.
- 13 Gómez-Salgado J, Andrés-Villas M, Domínguez-Salas S, Díaz-Milanes D, Ruiz-Frutos C. Related Health Factors of Psychological Distress During the COVID-19 Pandemic in Spain. *Int J Environ Res Public Health*. 2020 Jan;17(11):3947.
- 14 Moreno C, Wykes T, Galderisi S, Nordentoft M, Crossley N, Jones N, et al. How mental health care should change as a consequence of the COVID-19 pandemic. *Lancet Psychiatry*. 2020 Jul 16.
- 15 Moore SA, Faulkner G, Rhodes RE, Brussoni M, Chulak-Bozzer T, Ferguson LJ, et al. Impact of the COVID-19 virus outbreak on movement and play behaviours of Canadian children and youth: a national survey. *Int. J Behav Nutr Phys Act*. 2020 Dec;17(1):1-1.
- 16 Chen IH, Chen CY, Pakpour AH, Griffiths MD, Lin CY. Internet-related behaviors and psychological distress among school children during COVID-19 school suspension. *J Am Acad Child Adolesc Psychiatry*. 2020 Oct 1;59(10).
- 17 The Canadian Press. Crisis lines face volunteer, cash crunch even as COVID-19 drives surge in calls. CBC. 2020 Apr 27 [cited 2020 Aug 20]. Available from: <https://www.cbc.ca/news/canada/british-columbia/crisis-lines-cash-volunteer-crunch-covid-19-coronavirus-1.5546202>.
- 18 Canadian Mental Health Association. Summary of mental health impacts of COVID-19: wave 2. Toronto, ON: Canadian Mental Health Association; [cited 2020 Dec 08]. Available from: <https://cmha.ca/wp-content/uploads/2020/12/CMHA-UBC-wave-2-Summary-of-Findings-FINAL-EN.pdf>.
- 19 University of British Columbia. COVID-19 survey highlights growing suicide and mental health risks across various groups [Internet]. Vancouver, BC: University of British Columbia; 2020 [cited 2020 Aug 26]. Available from: <https://news.ubc.ca/2020/06/25/covid-19-survey-highlights-growing-suicide-and-mental-health-risks-across-various-groups/>.
- 20 Moyser M. Gender differences in mental health during the COVID-19 pandemic. Ottawa, ON: Statistics Canada; 2020 Jul 9 [cited 2020 Aug 27]. Available from: <https://www150.statcan.gc.ca/n1/en/pub/45-28-0001/2020001/article/00047-eng.pdf?st=QjbcYQrT>.
- 21 Statistics Canada. The vulnerability of Canadians with disabilities during the COVID-19 pandemic. Ottawa, ON: Statistics Canada; 2020 Jul 6 [cited 2020 Aug 27]. Available from: <https://www150.statcan.gc.ca/n1/daily-quotidien/200706/dq200706a-eng.htm>.
- 22 Statistics Canada. The impact of the COVID-19 pandemic on Canadian families of children with disabilities. Ottawa, ON: Statistics Canada; 2020 Aug 27 [cited 2020 Sep 21]. Available from: <https://www150.statcan.gc.ca/n1/en/pub/45-28-0001/2020001/article/00066-eng.pdf?st=RDGtyQiC>.
- 23 Evra R, Mongrain E. Mental Health Status of Canadian immigrants during the COVID-19 Pandemic. Ottawa, ON: Statistics Canada; 2020 Jul 14 [cited 2020 Aug 27]. Available from: <https://www150.statcan.gc.ca/n1/en/pub/45-28-0001/2020001/article/00050-eng.pdf?st=MpYDOmRg>.
- 24 Salami B, Hegadoren K, Bautista L, Ben-Shlomo Y, Diaz E, Rammohan A, et al. Mental health of immigrants and non-immigrants in Canada: evidence from the Canadian health measures survey and service provider interviews in Alberta. Edmonton, AB: PolicyWise for Children and Families; 2017 [cited 2020 Dec 18]. Available from: <https://policywise.com/wp-content/uploads/resources/2017/04/2017-04APR-27-Executive-Summary-15SM-SalamiHegadoren.pdf>.

- 25** Government of British Columbia. New virtual mental health supports for COVID-19 on the way [news release]. Victoria, BC: Government of British Columbia; 2019 Apr 9 [cited 2020 Sep 21]. Available from: <https://news.gov.bc.ca/releases/2020MMHA0009-000655>.
- 26** Government of British Columbia. Increased funding to improve students' mental health [news release]. Victoria, BC: Government of British Columbia; 2019 Sep 4 [cited 2020 Sep 21]. Available from: <https://news.gov.bc.ca/releases/2019MMHA0100-001708>.
- 27** Government of British Columbia. Enhanced mental health programs support a safe return to school [news release]. Victoria, BC: Government of British Columbia; 2020 Sep 2 [cited 2020 Sep 21]. Available from: <https://news.gov.bc.ca/releases/2020MMHA0049-001632>.
- 28** Orpana H, Vachon J, Dykxhoorn J, McRae L, Jayaraman G. Monitoring positive mental health and its determinants in Canada: the development of the positive mental health surveillance indicator framework. *Health Promot Chronic Dis Prev Can.* 2016 Jan;36(1):1-10.
- 29** Canadian Mental Health Association. COVID-19 stay well in uncertain times [Internet]. Toronto, ON: Canadian Mental Health Association; [cited 2020 Aug 27]. Available from: www.cmha.bc.ca/covid-19.
- 30** Government of British Columbia. Mobile response team [Internet]. Victoria, BC: Government of British Columbia; [cited 2020 Aug 27]. Available from: <https://www2.gov.bc.ca/gov/content/overdose/mobile-response-team>.
- 31** British Columbia Psychological Association. COVID-19 psychological first aid service: information and sign up [Internet]. Vancouver, BC: British Columbia Psychological Association; 2020 [cited 2020 Aug 27]. Available from: <https://www.psychologists.bc.ca/covid-19-resources>.
- 32** BC Children's Hospital. Compass Mental Health: Supporting Providers [Internet]. Vancouver, BC: BC Children's Hospital; [cited 2020 Sep 21]. Available from: <http://www.bcchildrens.ca/health-professionals/clinical-resources/mental-health/compass-1-855-702-7272>.
- 33** Foundry. Find. Forge. Found [Internet]. Victoria, BC: Foundry; [cited 2020 Aug 27]. Available from: www.foundrybc.ca.
- 34** Kelty Mental Health Resource Centre. Kelty mental health resource centre [Internet]. Vancouver, BC: Kelty Mental Health Resource Centre; [cited 2020 Sep 21]. Available from: <https://keltymentalhealth.ca/>.
- 35** bc211. Welcome to bc211 [Internet]. Vancouver, BC: bc211; 2019 [cited 2020 Aug 27]. Available from: <http://www.bc211.ca/>.
- 36** Government of British Columbia. VictimlinkBC [Internet]. Victoria, BC: Government of British Columbia; [cited 2020 Aug 27]. Available from: <https://www2.gov.bc.ca/gov/content/justice/criminal-justice/victims-of-crime/victimlinkbc>.
- 37** Centre for Addiction and Mental Health. Results at a glance [Internet]. Toronto, ON: Centre for Addiction and Mental Health; 2020 [cited 2020 Aug 27]. Available from: http://www.delvinia.com/camh-coronavirus-mental-health/?utm_source=CAMH_per_cent20Landing_per_cent20Page&utm_medium=button&utm_campaign=Camh-Delvinia.
- 38** Statistics Canada. Impacts of COVID-19 on Canadians: first results from crowdsourcing. Ottawa, ON: Statistics Canada; 2020 Apr 23 [cited 2020 Sep 21]. Available from: <https://www150.statcan.gc.ca/n1/en/daily-quotidien/200423/dq200423a-eng.pdf?st=3AKqgUPY>.
- 39** British Columbia Academic Health Science Network. COVID-19 research inventory [Internet]. Vancouver, BC: British Columbia Academic Health Science Network; 2020 [cited 2020 Aug 27]. Available from: <https://bcahsn.ca/covid-19-response/covid-19-research-inventory/>.
- 40** BC Children's Hospital. New study looks into impact of pandemic on the mental health of young Canadians [Internet]. Vancouver, BC: BC Children's Hospital; [cited 2020 Sep 21]. Available from: <https://bcchr.ca/research/stories/new-study-looks-impact-pandemic-mental-health-young-canadians>.
- 41** Morneau Shepell. The mental health index report Canada, June 2020. Spotlight on the mental health impact of the COVID-19 pandemic. Toronto, ON: Morneau Shepell; 2020 Jun; [cited 2020 Sep 21]. Available from: <https://www.morneaushepell.com/permafiles/92827/mental-health-index-report-canada-june-2020.pdf>.

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