Ensuring the Success and Engagement of University Students in Times of Pandemic: The Issue of Mental Health

L. Tremblay & M. Brunette

Line Tremblay, Ph.D., C. Psych.
Full Professor, ltremblay@laurentian.ca
School of Kinesiology and Health Sciences, Faculty of Education and Health
Laurentian University, Sudbury (ON), Canada.

Michelle Brunette, Ph.D.
Director, Student Success, mkbrunette@laurentian.ca
Student Success Centre
Laurentian University, Sudbury (ON), Canada.

Abstract
Research suggests that mental health problems that were on the rise prior to the pandemic in the post-secondary education sector have worsened. The rise of mental health problems on university campuses poses significant challenges because of the links between mental health and academic success, perseverance, and obtaining a university degree. This article has two objectives. The first is to present an update on student mental health on university campuses, including prevalence rates, risk factors and the impact on academic performance. The second objective is to present strategies to address the challenges posed by mental health through examples and programs during the COVID-19 pandemic. The conclusion underscores the importance of governments investing in programs and resources to address this issue.

Keywords: post-secondary education, mental health services, academic success, pandemic

Résumé
La recherche suggère que les problèmes de santé mentale, qui étaient en augmentation avant la pandémie dans le secteur de l’éducation post-secondaire, se sont aggravés. L’augmentation des problèmes de santé mentale sur les campus universitaires pose des défis significatifs en raison des liens entre la santé mentale, le succès académique, la persistance dans les études et l’obtention d’un diplôme universitaire. Le présent article a deux objectifs. Le premier consiste à présenter une mise à jour de la littérature sur les problèmes de santé mentale chez les étudiants universitaires, incluant les taux de prévalence, les facteurs de risque et leur impact sur la performance académique. Le second objectif vise à présenter les stratégies pour adresser les défis posés par la santé mentale à travers des exemples et des programmes offerts durant la pandémie de COVID-19. La conclusion souligne l’importance pour nos gouvernements d’investir dans des programmes et des ressources pour adresser ce problème.

Mots-clés: éducation post-secondaire, services de santé mentale, succès académique, pandémie
Introduction

For more than a year, our world has been turned upside down by the COVID-19 pandemic. The virus outbreak led to an unprecedented historical and worldwide series of public health measures. Confinement, physical distancing, and other protective behaviors have been put in place to control the outbreak. In the education sector, public health guidelines required a rapid transition from face-to-face to virtual delivery teaching and learning. While public health measures are intended to control the progression of infections, they have negative effects on mental health. Indeed, there is mounting evidence that the severity of COVID-19 pandemic causes (Arslan et al., 2020; Dutheil et, 2020) or increases stress levels in those who are already suffer with mental health issues (Alzueta et al., 2020; Best et al., 2020; Dozois, 2020; First et al., 2020; Horigian et al., 2020; Karatzias et al., 2020; Koushik, 2020).

In post-secondary education, this situation is worrisome for two reasons. First, research suggests that mental health risks in pandemic situations are estimated to be greater among youth (Alzueta et al., 2020). Second, research in the past two decades point to an increase in mental health problems among university students (Armstrong & Young, 2015; Epstein et al., 2019; Ng & Padjen, 2019; Storrie et al., 2010). University students with mental health challenges may be at greater risk for increased symptoms during the pandemic.

The first objective of this paper is to review the literature on the current situation relative to post-secondary student mental health and implications for academic perseverance and success. The second objective is to propose an approach to support academic success of both students affected emotionally by the pandemic as well as those with pre-existing mental health conditions. Examples are provided from the author's institution as well as from the literature.

The Mental Health Situation

Prevalence and Trends

The Canadian Consortium of the American College Health Association (ACHA) recognized mental health of post-secondary students as a public health concern prior to the COVID-19 pandemic. The ACHA conducted the National College Health Assessment in 55,284 students from 58 different Canadian postsecondary institutions in the Spring 2019. They found 8.9% of the participants were diagnosed with a psychiatric condition, 23.7% reported being diagnosed or treated with anxiety, 19.1% with depression, and 45.6% and 15.3% respectively reported having experienced more than average level or tremendous level of stress during the last 12 months (ACHA National College Health Assessment, 2019). In comparison to previous ACHA surveys, these mental health conditions increased during the last decade. For example, depression rates estimated at 14.7% in 2016 were 47% higher than in 2013 (ACHA National College Health Assessment II, 2016).

Since the beginning of the pandemic, the rates of reported symptoms of anxiety in the general population have ranged from 13% to 61% and those of depression have ranged from 14% to 80% (Alzueta et al., 2020; Dozois, 2020; Horigian, et al., 2020; Karatzias et al., 2020;
Kim et al., 2020). Alzueta et al. (2020) and Best et al. (2020) found that changes in daily life caused by COVID-19 public health measures, such as strict social distancing practices and confinement, are better predictors of anxiety and depression symptoms than other sociodemographic characteristics. Thereby, a similar impact of university closures and the transition to e-learning on students’ mental health should be expected.

Several research findings support this assertion. First, young people are more likely to experience negative consequences of the pandemic on their mental health (Alzueta et al., 2020). Second, Dozois (2020) found that Canadian adults over the age of 18 who reported suffering from anxiety and depression prior to the pandemic have seen their symptoms double since the beginning of the health crisis. Third, Copeland et al. (2021) surveyed first year university students’ response to the COVID pandemic during the fall and spring semesters. They reported that the pandemic had moderate and persistent negative effects on students’ behavioral and emotional functioning, such as stress, and attention problems. Finally, Son et al.’s (2020) conducted semi-structured interviews with 195 university students one-month after a stay-home order in April 2020. Nearly three quarters of the study participants reported increased stress and anxiety, difficulty concentrating, and symptoms of depression led to decreased social interactions and concerns about academic performance and their wellbeing and that of their loved ones. Surprisingly, only 5% of these university students reported using counseling services (Son et al., 2020).

Impact of Mental Health on Academic Success and Persistence

The rise of mental health problems on campus poses challenges for post-secondary institutions, as research has indicated that student success and mental health are highly correlated (Choi et al., 2010; Storrie et al., 2010). Stress, anxiety and depression are associated with lower grades, dropout and psychosocial problems (ACHA, 2019; Shankar & Park, 2016; Storrie et al., 2010). The opposite effect is also true, namely that the stress associated with academic requirements is linked to psychosocial problems. Robinson et al. (2016) found that more than two-thirds of students concerned about their academic performance met the clinical criterion of psychological distress.

There is also a growing body of evidence demonstrating the links between mental health and university graduation. For example, Arria et al. (2013) found that symptoms of depression, whether present before university or after enrollment, increased the risk of dropping out of school. Boyraz et al. (2016) reported a similar association as students with depression struggled to achieve and maintain their desired GPA.

Absent from the current literature is an exploration of the impact of the pandemic on the academic commitment and performance of students, especially those with mental health problems. What we know is that students are concerned about the potential negative impact of the transition from face-to-face to online courses on their academic performance. Researchers suggest that students are concerned that the rapid transition to online courses could impact the quality of online courses, as well as technical difficulties and/ or timely access to instructor
support for comprehending course material (Hasan, & Bao, 2020; Son et al., 2020). According to Son and colleagues (2020), these concerns may explain why students report high levels of stress related to the perception of uncertainty in this new virtual environment and a decrease in their motivation and procrastination tendency.

Risk Factors

Research has identified several risk factors for developing mental health problems at university. These factors include socio-demographic characteristics, cultural identity, and stress. Studies conducted before and during the pandemic have identified several sociodemographic risk factors for developing mental health problems. Female, nonbinary/transgender, single and younger individuals, living in a high-income country were found to be at higher risk of depression and anxiety symptoms (Alzueta, et al., 2020; Best et al., 2020; Epstein et al., 2019). In university student, financial burden and stress were related to depression and anxiety (Epstein et al., 2019).

Cultural identity and belonging to marginalized minority groups also appears to be a factor associated with the risk of mental health problems because these groups experience more socio-economic inequalities and racism (Srivastava & Srivastava, 2019). Billingsley and Hurd (2019) found that discrimination led to increased symptoms of depression and lower academic achievement. Although the difference in rates of mental health problems between different cultural groups appears modest, it is significant, as shown by Ketchen-Lipson et al.’s (2018) study of 43,375 U.S. students from 60 universities. Given that the more than 500,000 international students attend Canadian universities, an increase of 135% over the data collected between 2010 and 2020 (Canadian Bureau for International Education, 2021), post-secondary institutions need to consider the increased risk to the mental health of this new clientele to ensure their integration and academic success.

Research shows that stress, especially if chronic, has a negative impact on the academic performance of university students (ACHA, 2019; Shankar & Park, 2016; Storrie, et al., 2010). Stress has been identified by students as the leading cause of academic difficulties (ACHA, 2019). According to a survey, almost half of respondents reported experiencing high stress in the past 12 months. Nearly 40% and 30% of survey participants identified stress and sleep difficulties, respectively, as circumstances which contributed to lower academic performance or decisions to drop a course. Anxiety (34.6%) and depression (24.2%) were also listed as contributing factors affecting their performance (ACHA, 2019). The multiple sources of stress for undergraduate students include course load, high grades expectations, sleep issues, balancing social needs with social activities, economic pressures, and financial burden (ACHA, 2019; Epstein et al., 2019; Kruisselbrink-Flatt, 2013; Shankar & Park, 2016). Therefore, students’ ability to deal with academic stress is a factor that allows them to persevere and succeed (Storrie et al., 2010).
Promoting Student Engagement and Success during the Pandemic

In order to maintain students’ engagement and foster positive learning experiences during the COVID-19 pandemic, institutions need to address the issues of mental health and barriers to the use of counselling services, help students to manage stress, while taking advantage of the features of online tools. The following section presents the basic principles and examples of interventions and programs.

Barriers to the Use of Mental Health Services

Even with the best mental health support and intervention programs, post-secondary institutions need to consider the issue of access and use. Indeed, although the prevalence of mental health problems has increased, as well as service requests, research shows that only a small number of students use professional mental health services (Ketchen-Lipson et al., 2018; McDonald et al., 2017; Son et al., 2020). Researchers in the field have identified several factors that explain the low rates of service utilization. Kruisselbrink-Flatt (2013) proposed that the increase in service requests is explained by the increase in the number of students from disadvantaged socio-economic backgrounds. This factor could also contribute to underutilization of service because these students generally do not have access to mental health care insurance (Dunley & Papadopoulos, 2019; Robinson et al., 2016). Membership in a racialized group is another factor associated with underutilization of services. Students belonging to an ethnic minority (e.g., Asian, Black, Native Peoples) are less likely than other students to seek help for mental health issues (Dunley & Papadopoulos, 2019; Ketchen-Lipon et al., (2018)).

There is a lack of knowledge about mental health services and difficulty recognizing symptoms of mental health problems which leads to underutilization of services (Dunley & Papadopoulos, 2019; Robinson, 2016). Armstrong and Young (2015) reported that nearly half of the students enrolled in their study had difficulty recognizing the most common manifestations of mental health problems, and that women were better than men in this regard. Kirsh et al. (2016) reported similar results and concluded that students' difficulties in recognizing their symptoms prevent them from seeking help.

Counselling Services and Promoting their Use

Long before the pandemic, the authors’ institution addressed the difficulties of accessing services, by offering a range of free services to students but has also expanded and diversified its offer to accommodate the pandemic situation. For example, our institution’s counseling service web page contains a set of information related to the pandemic situation and includes, without being limited to, tips to manage mental health during COVID-19, self-care during COVID-19, and a resource hub for mental health and wellness during the COVID-19 pandemic (Laurentian University, 2021a). Virtual counselling services are available by telephone or video conferencing. Due to health restrictions, the in-person drop-in clinic is no longer available, but the website offers guides students needing help, urgent support or in crisis situations. Counselling sessions are based on a solution-oriented approach to identifying the student's needs.
to determine which resources (e.g., community support groups) and services (e.g., psychotherapy) will be most likely to help the student. When making an appointment, the student is provided with a preparation guide informing them of the course of the session.

In addition to counselling sessions, students can take advantage of online tools. A new webpage, titled Are You Ok, was created and linked to the university’s main website landing page to help students triage their needs and guide them to appropriate and timely support to help students who are feeling overwhelmed, unable to cope, suffering a traumatic event, or with immediate concerns about the health or safety of themselves or others (Laurentian University, 2021b). In the remote learning environment, it was also critical to help link students to crisis services in their own location, for students who maintained residence in their home locations, including links for out of province and out of country students.

In addition, the institution added additional promotion of virtual tools, online resources and training opportunities to help students better understand and monitor their own mental health, well-being and stress levels. Some of these tools included WellTrack, and The Inquiring Mind, More Feet on the Ground (Laurentian University, 2021c). WellTrack is a free interactive self-help App to help students self monitor, build mental health awareness, and find solutions, based on a Cognitive-Behavioral therapeutic approach. From a training perspective, The Inquiring Mind Post-Secondary (TIM-PS) is aimed at helping campus and student leaders increase their awareness and knowledge about campus mental health issues, through an interactive, evidence-based online workshop. The More Feet on the Ground training is designed to help students recognize mental health issues, help them in knowing how to respond, and make an appropriate and timely referral for mental health services.

From a diversity lens, the university also invested in keep.meSAFE, a confidential and multilingual service, for out of province, US, and international students to access counselling services and crisis intervention by phone, video conference or the free My SSP app (Laurentian University, 2021a). In addition, the Indigenous Sharing and Learning Centre at this university employs an Indigenous counsellor to serve students of First Nations, Métis, and Inuit ancestry in manners consistent with the Indigenous worldview. Through the COVID-19 period an increase emphasis has also been made to enhance the peer health programming to help students reach and support other students in their peer network.

Considering mental health and student supports from a diversity lens is important for all universities, as diversity of the student body continues to grow. At the authors’ university, there is a commitment to increasing access to post-secondary studies, which results in a diverse student body which includes 52% of students are First Generation, on a path to be the first in their family to complete a degree, 14% of students self-identify as Indigenous, 12% our students report a disability, and in Fall 2020, there were more than 600 international students from 75 countries (Laurentian University, 2020).
Helping Students Manage Stress

Stress is defined as either a stimulus or a stressor, an internal physiological state (Selye, 1956) or as an interaction between the individual and the environment, the latter definition having given rise to the commonly used theory of appraisal (Aldwin, 2011; Lazarus & Folkman, 1984). The basic principle of the theory of appraisal is that the stress experience is the product of the individual's assessment of the potential threat of a situation, person or stimulus and the resources that person believes he or she has to deal with that situation. The concepts of control and predictability are essential to such an assessment and determine the level of stress experienced by the person (Beck, 2004). Indeed, the more an individual perceives that a situation is unpredictable and the less he perceives that he has control, the more stress he will feel.

Thus, the current pandemic situation has all the characteristics to create a state of stress in the general population, and particularly in university students (Son et al., 2020). Even before the pandemic, students identified stress as the main cause of their academic difficulties, blaming, among other things, the course load and their expectations for academic achievement (ACHA, 2019). The pandemic exacerbated student stress by adding uncertainty caused by the imposition of the new (virtual) course delivery method, thereby reducing students' perception of control.

It can be assumed that the effect of the pandemic is greater for first-year students because distance learning prevents them from creating a social network so important to academic success. In terms of mental health, this lack of access to socialization with peers has serious consequences. Indeed, research shows that individuals who have a large social network and report greater connectivity with others will have lower levels of stress and fatigue, and fewer concerns during confinement (Horigian et al., 2020; Nitschke et al, 2021) as well as among students, to be less likely to use alcohol to reduce stress (Lechner et al., 2020).

Research has shown the benefits of student participation in extra-curricular activities on campus on mental health and retention (Billingsley & Hurd, 2019; Boyraz et al., 2016). Student greater commitment to education (Boyraz et al., 2016), encourages success and student participation can even counteract the effects of discrimination on vulnerable groups (Billingsley & Hurd, 2019). Because institutions cannot offer face-to-face opportunities on campus to comply with health measures, they must be innovative. Although these are social activities offered online, the effect on stress management appears to be compelling. Indeed, during the pandemic, social cohesion (Best et al., 2020) and virtual social groups proved useful in helping individuals cope with stress, isolation and improved their psychological well being (for a review see Marmarosh et al., 2020).

For example, it is possible to offer, fully online, welcome and orientation activities for students at the beginning of the academic journey. At the authors’ university, orientation for new students was transformed into a fully virtual experience with online sessions in real time via Zoom and on-demand sessions available through a Virtual Backpack to help link students to resources when they needed it (Laurentian University, 2021d). Further, a First Year Coach program paired new students with an upper year student in small groups (Laurentian University, 2021e). The First Year Coach role was to reach out their new student cohort and to virtually
accompany them and encourage their participation in orientation and welcome activities, while offering support, and resources during the first months of the first semester. This program is beneficial not only for the recipients but also for students who volunteer to become coaches. In addition to the training they receive, student coaches have the opportunity to develop leadership and communication skills while demonstrating their commitment to community engagement.

For all students, whether they are in their first year or in the later years, it is not always easy to identify stress, its effects, and thus to find solutions. The first author has been teaching a three-credit course on stress management for several years. The objective of this course presents all aspects of stress and is adapted to the specific situation of university students. Students acquire all the theoretical knowledge of stress, such as its definition, physiology and mind-body connection to prevention and stress reduction techniques, but also have the opportunity to apply this knowledge through practical exercises in class (such as relaxation, guide imagery and mindfulness techniques) and out of class through applied homework. This course was offered to first-year students in the fall of 2020 prior to the start of classes and counted as 3-credits toward their degree.

Academic Support

The Student Success Centre at the authors’ university offers a range of resources to students with or without mental health problems to help them transition, navigate and excel in university life (Laurentian University, 2021f). All of these services have been adapted to be offered online in a way that complies with public health guidelines. Students have access to a range of personalised services such as one-on-one meetings with a Student Success Advisor, writing assistance, English language support for international students, study assistance, learning assistance and tutoring (Laurentian University, 2021f).

The university offers Student Success Seminars to support the transition to university life and to help manage the anxiety and uncertainty of the transitions, which have been particularly evident during the pandemic (Laurentian University, 2021e). These free seminars aim to strengthen students' writing, study, numeracy, and research skills, while also helping students in identifying strengths and weaknesses, acquiring effective stress management techniques, critical thinking skills and how to apply them to problem-solving and decision making, improving writing and presentation abilities, learning active listening skills to improve notetaking and increase group work skills.

Students can meet with Student Success Advisors for help such as course selection, registration, and interpreting university regulations. Advisors help students better understand their goals, their academic plans, and guide students as they make important decisions about their future. Writing assistance is available to all students who would like some extra help to improve their writing skills. Peer writing coaches are available to help student understanding academic integrity and intellectual property, referencing, or citing using different writing styles as well as other facets of writing academic work. The university language program also assists international students in need of developing or refining their English language competency at various skill
levels and supports international students in academic preparation and bridging to university. Finally, the Centre offers a number of learning assistance resources such as workshops, tutoring and mentoring, which are delivered remotely through the COVID-19 period. Monthly, over 4000 unique students access services in the Student Success Centre, which has contributed to a growing retention rate, evidenced by the year 1-2 retention rate growing to a 10-year high of 89% (Laurentian University, 2021g).

**Lectures in Virtual Delivery Mode and Student Participation**

Instructors measure student participation in course in a variety of ways, ranging from the mere presence in class to the number of questions asked and the contribution to the discussions. Regardless of the method of measurement, the benefits on learning and academic performance of student participation are numerous and well documented (Rocca, 2010 for a review). For example, participation has been associated with academic achievement (Elffers et al., 2012). However, student participation does not depend solely on their willingness or encouragement from the instructor. Research shows that classroom layout influences participation, that is, traditional row and column setting versus U-shaped arrangements, but that the effect depends on the level of anxiety and apprehension of the students, those who are more anxious preferring the traditional, less visible, arrangement (Rocca, 2010).

Social interactions are also among the factors affecting student participation, and thus contributing to learning. Vygotsky’s Theory of Human Development laid the groundwork for the study of the impact of social interactions on learning, described as a process that involves cognitive, social and cultural dimensions (Thomas, 2005). Thus, this approach establishes that student participation is essential to learning (Oztok, 2016). Indeed, participation is intimately linked to students' social interactions, those belonging to social groups tend to participate more (Rocca, 2010). The transition to online education as a result of the pandemic has changed the game for teachers in terms of student participation. Previous studies have shown that web-based lectures are less effective at promoting participation than face-to-face lectures (Rocca, 2010). Oztok (2016) suggests that the difficulty students have in interacting and discussing can be explained by the transactional distance, which he refers to a form of perceived psychological gap among learners in an educational setting. Thus, the online delivery method poses challenges to student participation, because of the difficulty for students to interact with each other, to create alliances and friendships that allow them to feel comfortable in a group. This is particularly difficult for first-year students and those with mental health issues such as anxiety.

Fortunately, new internet platforms offer much more powerful options than in the past. These new technical features allow instructors to adapt their courses to the constraints of virtual education. For example, platforms allow the instructor to split his group into smaller separate working groups, thus encouraging discussion. This option replicates pretty well what the instructor would do face-to-face. Students can also exchange on social media, although they perceive this tool as a two-edged sword, which both informs and distracts (Smith, 2016). The technology also allows students to record performances that would otherwise be done in person.
A Community-Oriented Approach to Supporting Students

Providing services to students with special needs such as those described above and addressing the barriers to their use are essential. However, addressing the mental health challenge on our campuses requires a comprehensive community approach that includes partnerships with various groups on and off campus. These groups include faculty, student associations, staff, and community agencies and groups. The entire university community - faculty, student leaders, and staff can be considered the first responders to mental health issues. They have direct access to students and are able to inform, identify and redirect students to resources. What these groups need is training, information, and support to serve as liaisons between students and those providing the services. The online resource ‘More Feet On The Ground’ is a great example of a program for first responders. This resource was developed by the Council of Ontario Universities, Brock University, and the Centre for Innovation in Campus Mental Health, and is funded by the Ontario Government (Centre for Innovation in Campus Mental Health, 2021). Accessible to faculty, administrators, students and staff, this site provides instruction and information on how to recognize, respond and refer students experiencing mental health issues on campus. In addition to encouraging members of the university community to register on this site, the university can organize various on-campus activities such as clinics during peak stress times (e.g. exams period), consultation around specific issues (e.g. suicide), and training for specific groups (e.g. athletic teams). Another good strategy for engaging students in mental health promotion is to include training within the academic curriculum.

Post-secondary institutions have an obligation to accommodate students who have been diagnosed with a mental health problem and to prevent and sanction any discrimination against them. University administration needs the full cooperation of faculty members with Accessibility Services in order to provide the necessary academic support to students with special needs. It is beneficial to involve faculty in developing effective strategies to support students in the classroom and in all aspects of learning assessment. Examples of accommodations include extra time for exams or assignments, one-on-one sessions with the instructor, assistance with notetaking in class (e.g., students with attention deficit and anxiety disorders), deferred exams, access to course materials, mentoring (e.g., for students who have been absent due to hospitalization). The type of accommodation varies according to the specific needs of each student and the situation in which they are living. Finally, students benefit greatly from learning and receive feedback from their peers (Lin, 2018). It is important to note that, regardless of the mode of delivery, the instructor is not only a person who creates and delivers an academic curriculum, but who through his behaviours, attitudes and communications with students is able to promote inclusion, well-being (Di Placito-De Rango, 2018) and actively challenging the stigma associated with mental illness (Srivastava & Srivastava, 2019). These skills are undoubtedly the best way to encourage student participation, especially among those with mental health problems. Finally, while admitting that this alternative is not perfect, current technology has allowed post-secondary institutions to continue their teaching activities despite the pandemic.
from their instructors about the importance of mental health issues, the services that are available to those who need them and not to hesitate to use them. This information should be presented to students at the beginning of each semester.

Finally, post-secondary institutions benefit from developing other types of partnerships with off-campus communities. Institutions are already collaborating with hospitals, school boards, health agencies, health professionals and community groups through students’ placement, internships, practicums and research. Universities benefit from collaborating with these agencies to establish referral processes, integrate the various support services by the different agencies on and off campus, and organize off-campus counselling clinics. All of these initiatives are good examples of how universities can better support students. These partnerships need to be fully collaborative with each partner having the opportunity to contribute to the establishment of roles, decision-making, and structure of the partnership. The benefits of these collaborations are numerous and include the possibility of increasing off-campus counseling services to students as well as faster access for students with complex problems, as well as enabling the development of new programs (e.g. suicide prevention).

**Conclusion**

Considering the rising trends in mental health problems and their impact on all aspects of academic functioning and student success, post-secondary institutions will face major future challenges. This is particularly the case for rural and small institutions that need to compensate for the budgetary constraints and understaffing, including mental health professionals, with innovative solutions (Kruisselbrink-Flatt, 2013; Ng & Padjen, 2019). To address the lack of resources, post-secondary institutions will benefit from partnering with community organizations that provide mental health services. That being said, such partnerships will not be sufficient to meet all the needs. Indeed, only post-secondary institutions have all the expertise to enable students with special needs and mental health problems to succeed and develop professionally. The stakes are high as training needs have increased with the pandemic. This is why not only do governments not have to give up their role in education, but they will also have all the benefit of investing in services and programs through grants, either directly to universities or in the form of direct support to students. Among these benefits will be highly qualified professionals who can contribute to the advancement of society as leaders and citizens. It is a question of equity, justice, and access to education.

**References**

Aldwin, C. (2011). Stress and coping across the life span. In Susan Folkman (Ed.), *The Oxford Handbook of Stress, Health, and Coping* (pp 15-34). Oxford University Press.

Alzueta, E., Perrin P., Baker, F.C., Caffarra, S., Ramos-Usuga, D., Yuksel, D., & Arango-Lasprilla, J-C. (2020). How the COVID-19 pandemic has changed our lives: A study of psychological correlates across 59 Countries. *Journal of Clinical Psychology,*
American College Health Association - ACHA (2019). *National college health assessment II: Canadian reference group: executive summary.*
https://www.acha.org/documents/ncha/NCHA-II_SPRING_2019_CANADIAN_REFERENCE_GROUP_DATA_REPORT.pdf

American College Health Association - ACHA (2016). *National college health assessment II: Canadian reference group data report Spring 2016.*
https://www.acha.org/documents/ncha/NCHA-II%20SPRING%202016%20CANADIAN%20REFERENCE%20GROUP%20DATA%20REPORT.pdf

Armstrong, L.L., & Young, K. (2015). Mind the gap: Person-centred delivery of mental health information to post-secondary students. *Psychosocial Intervention, 24*(2), 83–87. Doi 10.1016/j.psi.2015.05.002

Arria, A.M., Caldeira, K.M., Vincent, K.B., Winick, E.R., Baron, R.A., & O’Grady, K.E. (2013). Discontinuous college enrollment associations with substance use and mental health. *Psychiatric Services, 64*(2), 165–72. https://doi.org/10.1176/appi.ps.201200106

Arslan, G., Yıldırım, M., Tanhan, A., Buluş, M., & Allen, K.-A. (2020). Coronavirus stress, optimism-pessimism, psychological inflexibility, and psychological health: psychometric properties of the Coronavirus Stress Measure. *International Journal of Mental Health and Addiction.* Advance online publication. https://doi.org/10.1007/s11469-020-00337-6

Beck, R.C. (2004). *Motivation: Theories and principles* (5th ed., pp. 271-277). Pearson Prentice Hall.

Best, L. A., Law, M. A., Roach, S., & Wilbiks, J. M. P. (2020). The psychological impact of COVID-19 in Canada: Effects of social isolation during the initial response. *Canadian Psychology.* Advance online publication. http://dx.doi.org/10.1037/cap0000254

Billingsley, J.T., & Hurd, N.M. (2019). Discrimination, mental health, and academic performance among underrepresented college students: The role of extracurricular activities at predominantly white institutions. *Social Psychology of Education, 22*, 421–446. https://doi.org/10.1007/s11218-019-09484-8

Boyraz, G., Horne S.G., Owens, A.C., Armstrong, A.P. (2016). Depressive symptomatology and college persistence among African American college students. *Journal of General Psychology, 143*(2), 144–60. DOI:10.1080/00221309.2016.1163251

Canadian Bureau for International Education. (2021). Facts and Figures. UpToDate. Retrieved June 18, 2021, from https://cbie.ca/infographic/

Centre for Innovation in Campus Mental Health. (2021). Welcome to more feet on the ground! Retrieved September 10, 2021, from https://morefeetontheground.ca/

Choi, K-H., Buskey, W., & Bonita Johnson, B. (2010). Evaluation of counseling outcomes at a university counseling center: The impact of clinically significant change on problem resolution and academic functioning. *Journal of Counseling Psychology, 57*(3), 297–303. DOI: 10.1037/a0020029
Copeland, W. E., McGinnis, E., Bai, Y., Adams, Z., Nardone, H., Devadanam, V., Rettew, J., & Hudziak, J.J. (2021). Impact of COVID-19 pandemic on college student mental health and wellness. Journal of the American Academy of Child and Adolescent Psychiatry, 60(1), 134–141. https://doi.org/10.1016/j.jaac.2020.08.466

Di Placito-De Rango, M. L. (2018). Situating the post-secondary instructor in a supportive role for the mental health and well-being of students. International Journal of Mental Health and Addiction, 16, 284–290. DOI 10.1007/s11469-017-9740-4

Dutheil, F., Mondillon, L., & Navel, V. (2020). PTSD as the second tsunami of the SARS-Cov-2 pandemic. Psychological Medicine, 1–2. https://doi.org/10.1017/S0033291720001336

Dozois, D.J.A. (2020). Anxiety and depression in Canada during the COVID-19 pandemic: A national survey. Canadian Psychology. Advance online publication. http://dx.doi.org/10.1037/cap0000251.

Dunley, P., & Papadopoulos, A. (2019). Why is it so hard to get help? Barriers to help-seeking in postsecondary students struggling with mental health issues: A scoping review. International Journal of Mental Health and Addiction, 17, 699–715. https://doi.org/10.1007/s11469-018-0029-z

Elffers, L., Oort, F.J., & Karsten, S. (2012). Making the connection: The role of social and academic school experiences in students' emotional engagement with school in post-secondary vocational education. Learning and Individual Differences, 22(2), 242–250. https://doi.org/10.1016/j.lindif.2011.08.005

Epstein, I., Khanlou, N., Balaquiao, L., & Chang, K.-Y. (2019). University students’ mental health and illness experiences in health and allied health programs: A scoping review. International Journal of Mental Health and Addiction, 17, 743–764. https://doi.org/10.1007/s11469-018-9987-4

First, J.M., Shin, H., Ranjit, Y.S., & Houston, J.B. (2020). COVID-19 Stress and depression: Examining social media, traditional media, and interpersonal communication. Journal of Loss and Trauma, 26(2), 101-115. DOI: 10.1080/15325024.2020.1835386

Hasan, N., & Bao, Y. (2020). Impact of “e-learning crack-up” perception on psychological distress among college students during COVID-19 pandemic: A mediating role of “fear of academic year loss”. Children and Youth Services Review, 118. https://doi.org/10.1016/j.childyouth.2020.105355

Horigian, V.E., Schmidt, R.D., & Feaster, D.J. (2020). Loneliness, mental health, and substance use among US young adults during COVID-19. Journal of Psychoactive Drugs, 53(1), 1-9. DOI: 10.1080/02791072.2020.1836435

Karatzias, T., Shevlin, M., Murphy, J., McBride. O., Ben-Ezra, M., Bentall, R.P., Vallières, F., & Hyland, P. (2020). Posttraumatic stress symptoms and associated comorbidity during the COVID-19 pandemic in Ireland: A population-based study. Journal of Traumatic Stress, 33, 365–370. DOI: 10.1002/jts.22565

Ketchen-Lipson, S., Kern, A., Eisenberg, D., & Breland-Noble, A.M. (2018). Mental health
disparities among college students of color. *Journal of Adolescent Health*, 63, 438-356. https://doi.org/10.1016/j.jadohealth.2018.04.014

Kirsh, B., Friedland, J., Cho, S., Gopalasuntharanathan, N., Orfus, S., Salkovitch, M., Katrina Snider, K., & Webber, C., (2016). Experiences of university students living with mental health problems: Interrelations between the self, the social, and the school. *Work*, 53(3), 325–335. DOI:10.3233/WOR-152153

Koushik, N. S. (2020). A population mental health perspective on the impact of COVID-19. *Psychological Trauma: Theory, Research, Practice, and Policy*. Advance online publication. http://dx.doi.org/10.1037/tra0000737

Kruisselbrink-Flatt, A. (2013). A suffering generation: Six factors contributing to the mental health crisis in North American higher education. *College Quarterly*, 16(1), 1-17. https://eric.ed.gov/?id=EJ1016492

Laurentian University. (2020). Under-represented group survey 2019. https://tableau.laurentian.ca/#/site/IPOData/workbooks/865/views

Laurentian University. (2021a). *Wellness and COVID-19*. https://laurentian.ca/counselling/wellness

Laurentian University. (2021b). *Are you ok?* https://laurentian.ca/areyouok

Laurentian University. (2021c). *Counselling. Virtual and online services*. https://laurentian.ca/counselling

Laurentian University. (2021d). *Orientation schedule*. https://laurentian.ca/orientation/schedule

Laurentian University. (2021e). *First-year coach*. https://laurentian.ca/orientation/first-year-coach

Laurentian University. (2021f). *The Student Success Centre*. https://laurentian.ca/student-success-centre

Laurentian University. (2021g). *2021 Maclean’s ranking* (Institutional Planning, 1037) [Data set]. Laurentian Tableau.

Lazarus, R.S., & Folkman, S. (1984). *Stress, Appraisal and Coping*. McGraw-Hill. DOI:10.4135/9781412952576.n198

Lechner, W.V., Laurene, K.R., Patel, S., Anderson, M., Grega, C., & Kenne, D.R. (2020). Changes in alcohol use as a function of psychological distress and social support following COVID-19 related University closings. *Addictive Behaviors*, 110, 106527. https://doi.org/10.1016/j.addbeh.2020.106527

Lin, G-Y. (2018). Anonymous versus identified peer assessment via a Facebook-based learning application: Effects on quality of peer feedback, perceived learning, perceived fairness, and attitude toward the system. *Computers & Education, 116*, 81-92. https://doi.org/10.1016/j.compedu.2017.08.010

Marmarosh, C.L., Forsyth, D.R., Strauss, B., & Burlingame, G.M., (2020). The psychology of the COVID-19 pandemic: A group-level perspective. *Group Dynamics: Theory, Research, and Practice*, 24(3), 122–138. http://dx.doi.org/10.1037/gdn0000142

McDonald, B., Kulkarni, M., Andkhoie, M., Kendall, J., Gall, S., Chelladurai, S., Yaghoubi, M.,
McClean, S., Szafron, M., and Farag, M. (2017). Determinants of self-reported mental health and utilization of mental health services in Canada. *International Journal of Mental Health, 46*(4), 299–311. [https://doi.org/10.1080/00207411.2017.1345045](https://doi.org/10.1080/00207411.2017.1345045)

Nitschke, J.P., Forbes, P.A.G., Ali, N., Cutler, J., Apps, M.A.J., Lockwood, P.L., & Lamm, C. (2021). Resilience during uncertainty? Greater social connectedness during COVID-19 lockdown is associated with reduced distress and fatigue [Special Section]. *British Journal of Health Psychology, 26*, 553-569. DOI:10.1111/bjhp.12485

Ng, P., & Padjen, M. (2019). An overview of post-secondary mental health on campuses in Ontario: Challenges and successes. *International Journal of Mental Health and Addiction, 17*, 531–541. [https://doi.org/10.1007/s11469-018-0015-5](https://doi.org/10.1007/s11469-018-0015-5)

Oztok, M. (2016). Reconceptualizing the pedagogical value of student facilitation. *Interactive Learning Environments, 24*(1), 85–95. [http://dx.doi.org/10.1080/10494820.2013.817440](http://dx.doi.org/10.1080/10494820.2013.817440)

Rocca, K. A. (2010). Student participation in the college classroom: An extended multidisciplinary literature review. *Communication Education, 59*(2), 185–213. doi:10.1080/03634520903505936

Robinson, A.M., Jubenville, T.M., Renny, K., & Cairns, S.L. (2016). Academic and mental health needs of students on a Canadian campus. *Canadian Journal of Counselling and Psychotherapy, 50*(2),108–123. [https://cjc-rcc.ucalgary.ca/article/view/61100](https://cjc-rcc.ucalgary.ca/article/view/61100)

Selye, H. (1956). *The Stress of Life*. McGraw-Hill.

Shankar, N.L., & Park, C.L. (2016). Effects of stress on students’ physical and mental health and academic success. *International Journal of School and Educational Psychology, 4*(1), 5-9. [http://dx.doi.org/10.1080/21683603.2016.1130532](http://dx.doi.org/10.1080/21683603.2016.1130532)

Smith, E.E. (2016). “A real double-edged sword:” Undergraduate perceptions of social media in their learning. *Computers & Education, 103*, 44e58. [https://doi.org/10.1016/j.compedu.2016.09.009](https://doi.org/10.1016/j.compedu.2016.09.009)

Son, C., Hegde, S., Smith, A., Wang, X., & Farzan, S. (2020). Effects of COVID-19 on college students’ mental health in the United States: Interview survey study. *Journal of Medical Internet Research, 22*(9), e21279. Doi: 10.2196/21279

Srivastava, R., & Srivastava, R. (2019). Impact of cultural identity on mental health in post-secondary students. *International Journal of Mental Health and Addiction, 17*, 520–530. [https://doi.org/10.1007/s11469-018-0025-3](https://doi.org/10.1007/s11469-018-0025-3)

Storrie, K., Ahern, K., & Tuckett, A. (2010). A systematic review: Students with mental health problems - A growing problem. *International Journal of Nursing Practice, 16*(1), 1-6. Doi: 10.1111/j.1440-172X.2009.01813.x

Thomas, R.M., (2006). *Comparing Theories of Child Development*, (6th ed., pp. 229-255). Thompson Wadsworth.

Licensed under a Creative Commons Attribution 4.0 International license (CC--BY 4.0)