Facing the **Challenge of Care** for Child and Youth Mental Health in Canada:

A Critical Commentary, Five Suggestions for Change and a Call to Action

Stan Kutcher

Neuropsychiatric disorders contribute most to the global burden of disease in young people (World Health Organization [WHO] 2003), approaching about 30% of the total global disease burden in those aged 10–19 years. Comparative data are not available for Canada, but the proportional burden of mental disorders in Canadian youth would be expected to be higher as our rates of human immunodeficiency virus/acquired immunodeficiency syndrome, tuberculosis, malaria and iron-deficiency disorders are substantially less than those in low-income countries. National estimates identify that about 15% of Canadian young people suffer from a mental disorder, but only about one in five of those who require professional mental health care actually receive it (Government of Canada 2006; Health Canada 2002; Kirby and Keon 2006; McEwan et al. 2007; Waddell and Shepherd 2002). And recent reports suggest that the human fallout from this reality may go beyond the well-known negative impacts of early-onset mental disorders on social, interpersonal, vocational and economic outcomes. For example, rates of mental disorder are very high in incarcerated youth, suggesting that, for some, jails are becoming the home for mentally ill young people (Kutcher and McDougall 2009).

The reasons for this wide gap in care availability versus need are multiple and complex but include a lack of health human resources trained to effectively deliver needed mental health care; archaic mental health service silos operating in parallel to usual healthcare; stigmatization of brain diseases including mental disorders; inadequate availability of effective and appropriate child and youth mental health care at the primary care level; an inadequate development of scientifically validated interventions and substantially inadequate funding for children's mental health care. Suffice it to say, the availability of appropriate mental health care for children and youth in Canada does not come close to meeting the need (Kirby and Keon 2006; Kutcher and Davidson 2007; Waddell et al. 2002).

The availability of appropriate mental health care for children and youth in Canada does not come close to meeting the need.

Current estimates identify that about 70% of all mental disorders are diagnosable prior to age 25 years (Kessler et al. 2005; Kutcher and Davidson 2007). This includes, for example, the classic neuro-developmental conditions such as the autism spectrum disorders, attention deficit hyperactivity disorder (ADHD) and fetal alcohol syndrome, as well as mental disorders that have primarily a prepubertal onset (such as separation anxiety disorder) and those that can be diagnosed in the 10–15 years post puberty (e.g., major depressive disorder, schizophrenia, substance abuse, panic disorder, anorexia nervosa, etc.). These mental disorders tend to be persistent (chronic or reoccurring), exert substantial short- and long-term morbidity, be closely related to premature death by suicide, increase the risk for numerous physical illnesses (e.g., heart disease and diabetes) and decrease optimal social, economic and personal successes. While early identification, correct diagnosis and proper provision of best evidence–based interventions are known to improve both short- and long-term outcomes, even the best available treatments may not provide persistent and long-term disorder-free periods following a single application of an intervention; thus, long-term care or ongoing monitoring and follow-up are frequently required (Kessler et al. 1995; Kutcher et al. 2009; Leitch 2009).

Primary prevention of child and youth mental disorders is still very much an inexact undertaking, and while there is relatively strong evidence for the effectiveness of secondary prevention, primary prevention of mental disorders as distinct from primary prevention of long-term mental distress and social disability is not yet sufficiently well understood. Mental health promotion, while intrinsically appealing in and of itself, has yet to unambiguously demonstrate substantive and long-term positive impacts on sustained and persistent improvements in population mental health indicators or on significant improvements in the onset, course or outcome of child and youth mental disorders. Added to these ongoing challenges is the relative dearth of evidence-based care in child and youth mental health in comparison to that found in other areas of pediatric or adolescent medicine or to that found in care of adult mental disorders.

Nonetheless, much is currently known about what could be done to improve the organization and delivery of mental health care for young people; yet there is a gap between what we know can be done and what is being done. While there are many different reasons for the existence of this gap, one of the most pernicious and difficult to change is the historical reality of mental health care being primarily provided by a parallel health system – mental health services. At its zenith, this model was based on the mental hospital or asylum, but even with the closing of most of the mental hospitals across Canada, the silo separation of mental health from the rest of health has persisted. This separation (e.g., stand-alone community mental health services) may have perpetuated the stigma associated with mental disorders and delayed the development of evidence-based interventions in the mental health arena. It is increasingly becoming evident that perpetuating this silo approach does not serve the holistic health needs of youth or their families and that access to best evidence–provided mental health care cannot be most appropriately achieved without full integration of mental health care with all healthcare (Kutcher and Davidson 2007; Kutcher et al. 2009; Leitch 2009; WHO/Wonca 2010).

The challenge now is to move quickly and efficiently to address how to best deliver widely accessible, effective and

Photo credit: istockphoto.com

efficient child and youth mental health care, realizing that this may require a transformation of how we have traditionally approached this issue. Concurrently, it is essential that action directed toward the improvement of child and youth mental health care be driven as much as possible by best evidence not by best practice, and that the application of plans, programs and interventions be based not on what feels right but on what has been demonstrated to be right.

While there are many domains that require attention, in my opinion, five areas stand out as in particular need of urgent address. These are (1) developing and effectively applying child and youth mental health policy; (2) increasing the availability of evidence-based care options through research and effective translation of best evidence; (3) enhancing the capacity of the primary healthcare sector to provide effective and cost-effective child and youth mental health care; (4) integrating schools with healthcare providers in the service of mental health promotion, early identification and effective intervention; (5) enhancing the capacity of all human service providers to implement mental health interventions consistent with their current and ongoing roles. While these are sequentially discussed here, concurrent development and application of all five domains may be expected to more quickly impact the availability and provision of child and youth mental health care.

1 Child and Youth Mental Health Policy

According to the World Health Organization (WHO 2005), a mental health policy is the foundation for the development and delivery of all aspects of mental health care, ranging from promotion to long-term interventions. Unfortunately, as recent research has demonstrated, a substantial minority of Canadian provinces and territories has developed and applied child and youth mental health policies (Kutcher et al. 2010). And, as this recent assessment has shown, those child and youth mental health policies that are available are not consistent across jurisdictions and are often deficient in key domains (Kutcher et al. 2010). Clearly, there is an immediate need for all provinces and territories to move forward to ensure that there are up-to-date child and youth mental health policies in place that are based on human rights and driven by best evidence; these policies should be used to guide the approach of the provinces and territories to addressing child and youth mental health needs within their jurisdictions.

Canada has no national child and youth mental health policy and, indeed, given our federal system and the constitutional allocation of responsibilities and authority for healthcare, this may not be appropriate. Nevertheless, a national child and youth mental health framework may be of value to assist and support provinces and territories in their development and application of mental health policies, plans and programs. The recently completed national Evergreen Framework project of the Child and Youth Advisory Committee of the Mental Health Commission of Canada (MHCC) (Kutcher and McLuckie 2009) is a step in that direction. (The Evergreen Framework can be accessed at www..teenmentalhealth.org or www.mentalhealthcommission.ca). Time will tell if it will be used effectively.

2 Enhancing Evidence-Based Intervention Capability through Research and Effective Translation of Best Available Evidence

Healthcare consumers, their families, health providers, payers and policy makers all want, need and require best evidence–based interventions. Unfortunately, the patient-oriented evidence base in child and youth mental health is comparatively underdeveloped, and in many areas in which clear and compelling evidence of effectiveness and cost-effectiveness exists (see, e.g., the diagnosis and treatment of ADHD [Canadian Attention Deficit Hyperactivity Disorder Resource Alliance (CADDRA): 2009] there is a lack of public knowledge and indeed substantial misinformation or even disinformation (see, e.g., Abraham 2010, October 18) that hampers its application. In comparison to other medical interventions (e.g., those in epilepsy or oncology), there are few, if any, consistently applied national treatment protocols and few nationally consistent expectations of the routine use of guideline-based treatment protocols from local, regional or provincial funders, regulators or service provision authorities.

In substantial part, this may be due to the relative lack of patient-oriented research that has occurred and is occurring within the field of child and youth mental health. This is impacted by relatively small amounts of designated funding for such research and the very small pool of properly trained investigators who can carry out such research. Few examples exist of child and youth mental health research teams who are active in clinical research anywhere in Canada. There is an immediate and substantial need to improve the child and youth mental health research environment and infrastructure across the entire nation.

Perhaps with the launch of the upcoming Canadian Institutes of Health Research (CIHR) Strategy for Patient-Oriented Research (CIHR 2010), there will be an opportunity for the creation of child and youth mental health research *support* units. However, given the lack of advocacy by and for child and youth mental health research supporters, this may not occur. The impending release of the just-completed report from the newly established Institute of Families, *Making Mental Health Research Work for Children, Youth and Families*, may have some impact on this need (Anderson et al. in press). This report represents an innovative approach to establishing child and youth mental health research priorities by bringing together members of the child and youth mental health research community with families and youth who have lived experience of mental

disorders to map out meaningful research directions. While useful, this approach will not in and of itself be able to drive any national or provincial/territorial research agenda. That will require active interventions at the political level, perhaps beginning with this issue being placed on the agenda of federal and provincial/territorial health meetings.

3 Enhancing Mental Health Care Capacity in Primary Care

The importance and positive impact of effectively addressing mental health in primary care has been long recognized, but only recently have systematic approaches to this been undertaken, nationally and internationally (Canadian Collaborative Mental Health Initiative 2005; Cheung 2007; Kutcher and Davidson 2007; WHO 2010; WHO/Wonca 2010). It is appreciated that with the availability of appropriate mental health care competencies and infrastructure supports, substantial proportions of common child and youth mental disorders can be effectively diagnosed, treated and managed in primary care settings. The WHO/Wonca (2010) publication *Integrating Mental Health into Primary Care* outlining this need has recently been followed by the publication of the *mhGAP Intervention Guide*, which provides basic mental health care frameworks that might be globally applied (WHO 2010). The Pan American Health Organization's Mental Health for the Americas has also identified the need for addressing child and youth mental health and primary care (Pan American Health Organization 2007). Other jurisdictions have implemented novel approaches to meeting mental health needs in primary care, including expanding the clinical role of nurses holding additional mental health competencies and creating family care teams, to name a few (Collins et al. 2010).

Nationally, the application of a consultative mental health care model (Canadian Collaborative Mental Health Initiative 2005) has resulted in increased interaction between primary care and specialty mental health services in some jurisdictions. Other approaches, using needs-driven, competencies-based child and youth mental health care training for application by primary care practitioners, are being implemented and evaluated. A national MAINPRO- and MAINCERT-certified web-based training program in youth depression, endorsed by the Canadian Medical Association was launched Canada-wide in February 2011 under the umbrella of continuing medical education for Canadian physicians (www.MDcme.ca).

While these initiatives are a welcome step in the right direction, they are still being developed and applied piecemeal without national coordination or systematic evaluation that includes analyses of comparative effectiveness and cost-effectiveness of various approaches. Provincial and territorial governments could move this process ahead by ensuring that primary healthcare delivery of child and youth mental health is embedded both in their primary healthcare and child and youth mental health policies/plans. A federally supported approach to the application and evaluation of this method may be expected to provide a useful and comprehensive analysis of outcomes that could then be applied in various jurisdictions dependent upon regional and local realities.

4 Integration of Child and Youth Mental Health and Schools

The role of schools in the provision of health promotion, case identification and even service delivery has long been recognized and globally applied (Koller 2006; New Zealand Ministry of Health 2003; UCLA School Mental Health Project 2009; Weist et al. 2003: WHO 1996). But in Canada, it has only recently been recognized that schools provide an important vehicle through which mental health promotion, mental disorder prevention, case identification, triage and intervention/continuing care can be realized (Canadian Council on Learning 2009; Joint Consortium for School Health 2009; Santor et al. 2009). Good mental health is also a learning enabler; thus, addressing mental health needs in the school setting may have positive impacts on both mental health and educational outcomes (Canadian Council on Learning 2009; Santor et al. 2009).

Schools provide an important vehicle through which mental health promotion, disorder prevention, case identification, triage and intervention can be realized.

Nationally, several initiatives in school mental health have recently begun, and the MHCC Child and Youth Advisory Committee has undertaken a Canada-wide scan of currently available school mental health programs and models. For example, evidence-based programs such as FRIENDS (http://www.mcf.gov.bc.ca/mental_health/friends.htmto:mcf.cymhfriends@gov.bc.ca) and Roots of Empathy (www.rootsofempathy.org) provide interventions designed to enhance pro-social behaviours. A Pathways to Care model that addresses the spectrum of mental health components (from mental health literacy-based promotion through mental health care provision) is currently being piloted in a number of locations (Wei et al. 2010, 2011). The Community Outreach in Pediatrics/Psychiatry and Education program (McLennan et al. 2008) provides another promising model that needs further evaluation. Mental health school curricula such as Healthy Minds, Healthy Bodies, which targets primary and junior high schools (Lauria-Horner and Kutcher 2004), and the Mental Health Curriculum

for Secondary Schools (which can be accessed at www.teenmentalhealth.org), which targets high schools, are now nationally available. Other initiatives including teacher training in mental health, school-based gatekeeper training and others are either just recently available in some areas or are under development (Szumilas and Kutcher 2008, June). The Joint Consortium for School Health (2009) has recently begun to focus activity in school mental health using a variety of innovative webinars and other approaches to advance information sharing and knowledge translation in this domain. Canadian participation in the cross-national school mental health initiative Intercamhs (International Alliance for Child and Adolescent Mental Health and Schools; www.intercamhs.org) has increased in recent years. Evergreen, the national child and youth mental health framework, contains many suggestions for addressing mental health in the school setting.

Once again, while there exist a number of important and innovative initiatives pertaining to school mental health in Canada, these are not integrated, are not coordinated and have largely developed outside of a policy framework and without dedicated research or program funding. What is now needed is a national initiative such as a school mental health network that can, as part of its functioning, play the necessary developmental, research and collaboration-enhancing roles that are needed to move this agenda forward. Unfortunately, no national vehicles with acceptable authority and needed funding are uniquely positioned to be able to meet this need. The Public Health Agency of Canada may be an appropriate federal source of support, but intra-agency leadership to enable that support may be needed, and federal leadership will require putting child and youth mental health on the national political agenda. Mental health funding opportunities supported by the private sector (such as that recently announced by Bell Canada; http://letstalk.bell.ca/?EXT=CORP_OFF_URL_letstalk_en) and possible partnerships among existing players in this domain may provide a unique opportunity to move this needed innovation forward.

5 Enhancing the Child and Youth Mental Health Care Competencies of All Human Service Providers

Understanding child and youth neuro-development and the complex interplay between genetics and environment must be a fundamental component of training for all human service providers who work with children and youth. Furthermore, knowing about child and youth mental disorders is essential for those human service providers working in family and community service organizations, the justice system, healthcare and recreation. Whether these providers are located within the public or private sectors (such as non-governmental organizations), the capacity to understand development and how to identify or appropriately support and intervene in situations in which mental disorders can be detected is an essential competency. Furthermore, healthcare providers, including pediatricians, family physicians, nurses, social workers etc. should be well versed in the full spectrum of mental health care of children and youth consistent with their roles.

Unfortunately, training in child and youth mental health of both human service providers and many healthcare providers who work primarily or in large part with children and youth is inadequate. For example, residents in pediatrics often spend less than three months out of their four or five years of residency training in child and youth mental health, even though it is estimated that the mental health case load of community-based pediatricians may reach as high as 40–60% of their practice (personal communication, Dr. Diane Sacks, MHCC Child and Youth Advisory Committee; April, 2010) To my knowledge, there is no compulsory minimum training in child and youth mental health in all residency training programs for family physicians. Teachers, who comprise the professional group who spend the largest amount of time with non-diagnosed children and youth, receive little or in some cases no training in child and youth mental health and the identification of mental disorders in this age group.

While some of the shortfall in competencies can be made up with continuing professional education, to adequately address this issue will require modifications to the training programs for all human services and health human resources providers. This includes programs delivered through universities and community colleges. Without this fundamental change, we cannot expect that the professionals who spend much of their time with our young people will have the competencies required to meet their mental health care needs.

Given the diverse nature of the educational experiences of various professional groups, the different educational institutions that offer programs and the roles of numerous professional organizations in the creation of standards and core competencies that guide the development and delivery of training programs, it is unlikely that a coordinated and comprehensive approach to this issue created and applied by the players responsible for professional education will be made available at any time in the near future. In some cases, the marketplace may play a role, such as in the development of new mental health provider designations (e.g., the graduate certificate in child and youth mental health at Thompson Rivers University), and institutions of higher education may respond. Provincial governments and health authorities may possibly influence this process either by partnering with educational institutions to create and deliver such training or by creating job categories or competencies that will encourage their development.

Conclusion

Nationally, and globally, we are realizing that there can be no health without mental health, and that not only is child and youth mental health a key foundational component to personal, family, community and civic well-being but that enhancement of mental health and the early identification, diagnosis and effective evidence-based treatment of mental disorders may result in positive long- and short-term benefits at all levels of society. Whether the argument for investment in child and youth mental health care is made on grounds of equity and social justice or economics, the outcome is the same. And, while the field is in need of additional best evidence to guide care delivery, there is ample knowledge currently available to effectively and efficiently better address this need. This application, however, must be built on a de-stigmatized appreciation of the burden of neuropsychiatric disorders in young people and requires political will at federal, provincial and local levels. It also requires substantial changes to how we currently think about and provide child and youth mental health services. At its most basic, we need to stop thinking about silo and parallel mental health services and begin thinking about mental health care that is fully integrated across the human services and healthcare sectors. We need to establish that changes made are supported by best evidence policies, services and interventions, and we need to ensure that youth, families and researchers are included in developing solutions, implementing change and evaluating outcomes.

There can be no health without mental health.

This I understand is a tall order, but it is a challenge that we all need to take up. Child and youth mental health care is a point where human rights, human well-being, best evidence arising from best research, economic development and the growth of civic society intersect. The MHCC has been a useful first step in addressing this challenge, but it does not carry the responsibility, authority or funding capacity needed to move this agenda effectively across Canada. The next step is to put child and youth mental health care on the national healthcare agenda.

My suggestion is for the federal government to place this issue on the list for discussion and resolution during the upcoming negotiations of the Health Accord. Our Canada Health Act (Health Canada 1984) has been a useful policy instrument toward the creation of our national public health model; and the next iteration of the Health Accord gives us an opportunity to move the goalposts farther ahead while remaining true to the spirit of the act.

One consideration for a structural solution to this need, in addition to a legislative approach, would be to create at the federal level a National Commissioner of Child and Youth Health, reporting to the minister of health or perhaps directly to Parliament, who would integrate mental health into other child and youth health priorities. A version of this approach has been proposed by Leitch in her report *Reaching for the Top* (2009). An alternative would be to create a Minister of State for Child and Youth Health who would have a similar responsibility. Whatever the model, political action at the national level seems to be essential to help to move this agenda forward. HQ

References

Abraham, C. 2010, October 18. "Part 3: Are We Medicating a Disorder or Treating Boyhood as a Disease?" *Globe and Mail.* Retrieved February 4, 2011. <http://www.theglobeandmail.com/news/national/time-to-lead/failing-boys/part-3-are-we-medicating-a-disorder-or-treating-boyhood-as-a-disease/article1762859/>.

Anderson, K., S. Kutcher and J. Davidson. In press. *Making Mental Health Research Work for Children, Youth and Families.*

Canadian Attention Deficit Hyperactivity Disorder Resource Alliance. 2001. *Canadian ADHD Practice Guidelines* (3rd ed.). Toronto, ON: Author. Retrieved February 5, 2001. <http://://www.caddra.ca/cms4/index.php?option=com_content&view=article&id=26&Itemid=353&lang=en>.

Canadian Collaborative Mental Health Initiative. 2005. *Collaborative Mental Health Care in Primary Care: A Review of Canadian Initiatives.* Mississauga, ON: Canadian Collaborative Mental Health Initiative. Retrieved March 11, 2010. <http://www.iccsm.ca/en/products/documents/05a_CanadianReviewI-EN.pdf >.

Canadian Council on Learning. 2009. *A Barrier to Learning: Mental Health Disorders among Canadian Youth.* Ottawa, ON: Author. Retrieved January 20, 2010. <http://www.ccl-cca.ca/CCL/Reports/LessonsInLearning/LinL200900415MentalhealthBarrier.htm>.

Canadian Institutes of Health Research. 2010. *Strategy for Patient-Oriented Research: A Discussion Paper for a 10-Year Plan to Change Health Care Using the Levers of Research.* Ottawa, ON: Author. Retrieved November 12, 2010. <http://www.cihr.gc.ca/e/41232.html>.

Cheung, A. 2007. "Review: 3 of 4 RCTs on the Treatment of Adolescent Depression in Primary Care Have Positive Results." *Archives of Disease in Childhood – Education and Practice Edition* 92(4): 128.

Collins, C., D.L. Hewson, R. Munger and T. Wade. 2010. *Evolving Models of Behavioral Health Integration in Primary Care.* Milbank Memorial Fund.

Government of Canada. 2006. *The Human Face of Mental Health and Mental Illness in Canada 2006* (Catalogue No. HP5-19/2006E). Ottawa, ON: Minister of Public Works and Government Services of Canada.

Health Canada. 1984. *Canada Health Act.* Ottawa, ON: Author. <http://laws.justice.gc.ca/PDF/Statute/C/C-6.pdf>.

Health Canada. 2002. *A Report on Mental Illnesses in Canada* (Catalogue No. 0-662-32817-5). Ottawa, ON: Author. <http://secure.cihi.ca/cihiweb/en/downloads/reports_mental_illness_e.pdf >.

Joint Consortium for School Health. 2009. *What Is Comprehensive School Health?* Summerside, PE: Author. Retrieved June 16, 2009. <http://eng.jcsh cces.ca/index.php?option=com_content&view=article&id=40&Itemid=62>.

Kessler, R.C., C.L. Foster, W.B. Saunders and P.E. Stang. 1995. "Social Consequences of Psychiatric Disorders I: Educational Attainment."

American Journal of Psychiatry 152(7): 1026–32.

Kessler, R.C., P. Berglund, O. Demler, R. Jin, K.R. Merikangas and E.E. Walters. 2005. "Lifetime Prevalence and Age-of-Onset Distributions of DSM-IV Disorders in the National Comorbidity Survey Replication." *Archives of General Psychiatry* 62(6): 593–602.

Kirby, M.J.L. and W.J. Keon. 2006. *Out of the Shadows at Last: Transforming Mental Health, Mental Illness and Addiction Services in Canada.* Ottawa, ON: Standing Senate Committee on Social Affairs, Science and Technology. Retrieved from December 26, 2009. <http://www.parl.gc.ca/39/1/parlbus/commbus/senate/Com-e/SOCI-E/rep-e/rep02may06-e.htm>.

Koller, J. 2006. "Responding to Today's Mental Health Needs of Children, Families and Schools: Revisiting the Preservice Training and Preparation of School-Based Personnel." *Education Treatment of Children* 29(2): 197.

Kutcher, S. and A. McDougall. 2009. "Problems with Access to Adolescent Mental Health Care Can Lead to Dealing with the Criminal Justice System." *Journal of the Canadian Pediatric Society* 14: 12–20.

Kutcher, S. and A. McLuckie. 2009. "Evergreen: Towards a Child and Youth Mental Health Framework for Canada." *Journal of the Canadian Academy of Child and Adolescent Psychiatry* 18: 5–7.

Kutcher, S., M.J. Hampton and J. Wilson. 2010. "Child and Adolescent Mental Health Policy and Plans in Canada: An Analytical Review." *Canadian Journal of Psychiatry* 55: 100–07.

Kutcher, S. and S. Davidson. 2007. "Mentally Ill Youth: Meeting Service Needs." *Canadian Medical Association Journal* 176: 417.

Kutcher, S., S. Davidson and I. Manion. 2009. "Child and Youth Mental Health: Integrated Healthcare Using Competency-Based Teams." *Journal of Paediatrics and Child Health* 14: 315–18.

Lauria-Horner, B.A. and S. Kutcher. 2004. "The Feasibility of a Mental Health Curriculum in Elementary School." *Canadian Journal of Psychiatry* 49: 208–11.

Leitch, K.K. 2009. *Reaching for the Top: A Report by the Advisor on Healthy Children and Youth* (Catalogue No. H21-296/2007E). Ottawa, ON: Health Canada.

McEwan, K., C. Waddell and J. Barker. 2007. "Bringing Children's Mental Health 'Out of the Shadows.'" *Canadian Medical Association Journal* 176(4): 471–72.

McLennan, J.D., M. Reckord and M. Clarke. 2008. "A Mental Health Outreach Program for Elementary Schools." *Journal of the Canadian Academy for Child and Adolescent Psychiatry* 17: 122–30.

New Zealand Ministry of Health. 2003. *Health Promoting Schools (Booklet 3): Mentally Healthy Schools.* Wellington, New Zealand: Author.

Pan American Health Organization. 2007. *Proposed Strategic Plan 2008–2012* (Official Document No. 328). Washington, DC: Author.

Santor, D., K. Short and B. Ferguson. 2009. *Taking Mental Health to School: A Policy-Oriented Paper on School-Based Mental Health for Ontario.* Ottawa, ON: The Provincial Centre of Excellence for Child and Youth Mental Health at Children's Hospital of Eastern Ontario.

Szumilas, M. and S. Kutcher. 2008, June. *Effectiveness of a Depression and Suicide Education Program for Educators and Health Professionals.* Poster presented at the Canadian Public Health Association Annual Conference, Halifax, NS.

University of California, Los Angeles, School Mental Health Project: Center for Mental Health in Schools. 2009. *Mental Health in Schools: Program and Policy Analysis.* Los Angeles, CA: Author. Retrieved June 16, 2009. <http://smhp.psych.ucla.edu/>.

Waddell, C. and C. Shepherd. 2002. *Prevalence of Mental Disorders in Children and Youth. A Research Update Prepared for the Ministry of Children and Family Development.* Vancouver, BC: University of British Columbia.

Waddell, C., D.R. Offord, C.A. Shepherd, J.M. Hua and K. McEwan. 2002. "Child Psychiatric Epidemiology and Canadian Public Policy-Making: The State of the Science and the Art of the Possible." *Canadian Journal of Psychiatry* 47(9): 825–32.

Wei, Y., S. Kutcher and M. Szumilas. In press. 2011. "Comprehensive School Mental Health: An Integrated Pathway to Care Model for Canadian secondary schools. *McGill Journal of Education.*

Wei, Y. and S. Kutcher, S. 2010. *A School-based Integrated Pathway to Care Model Mental Health Identification and Navigation (MH-IN) Pilot Project at Forest Heights Community School and South Shore Region, Nova Scotia (2010).* Accessed February 15, 2011: <http://teenmentalhealth.org/index.php/educators/mental-health-integration-and-navigation-mh-in>/

Weist, M.D., A. Goldstein, L. Morris and T. Bryant. 2003. "Integrating Expanded School Mental Health Programs and School-Based Health Centers." *Psychology in the Schools* 40(3): 297–308.

World Health Organization. 2003. *Caring for Children and Adolescents with Mental Disorders.* Geneva, Switzerland: Author.

World Health Organization. 2004. *The Global Burden of Disease.* Geneva, Switzerland: Author. Retrieved June 17, 2009. <http://www.who.int/healthinfo/global_burden_disease/GBD_report_2004update_full.pdf>.

World Health Organization. 2005. *Mental Health Policy and Service Guidance Package: Child and Adolescent Mental Health Policies and Plans.* Geneva, Switzerland: Author.

World Health Organization. 2010. *mhGAP Intervention Guide.* Geneva, Switzerland: Author.

World Health Organization Regional Office for Europe. 1996. *Regional Guidelines: Development of Health-Promoting Schools: A Framework for Action.* Manila, Philippines: WHO Regional Office for the Western Pacific. Retrieved April 21, 2011. <http://whqlibdoc.who.int/wpro/1994-99/a53203.pdf>.

World Health Organization/Wonca. 2010. *Integrating Mental Health into Primary Care – A Global Perspective.* Geneva, Switzerland: World Health Organization. Retrieved November 10, 2010. <http://www.who.int/mental_health/policy/services/mentalhealthintoprimarycare/en/index.html>.

Wei, Y., S. Kutcher and M. Szumilas. In press. "Comprehensive School Mental Health: An Integrated Pathway to Care Model for Canadian Secondary Schools." *McGill Journal of Education.*

About the Author

Stan Kutcher, MD, is the Sun Life Financial chair in adolescent mental health and director of the World Health Organization Collaborating Centre on Mental Health Training and Policy Development. He is based in Halifax, Nova Scotia.