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## Note From the Editors

## Mental Health Matters: Limited Support Remains a Barrier to Optimal Care for Youth With Diabetes

Over 20 years ago, the International Society for Pediatric and Adolescent Diabetes Clinical Practice Consensus Guidelines stated that “psychosocial factors are the most important influences affecting the care and management of diabetes” (1). However, mental health disorders continue to be undiagnosed and access to mental health services remains limited for children (ages <15 years), and youth (ages 15 to 24 years) with diabetes and their families. Children and youth with diabetes have consistently been demonstrated to have higher rates of depression, anxiety, psychological distress and eating disorders compared with their peers without diabetes (2,3). These mental health disorders are associated with acute and longer-term consequences, including decreased quality of life, suboptimal glycemic control, diabetes-associated complications (e.g. hypoglycemia, diabetic ketoacidosis and microvascular complications) and early diabetes-associated mortality (4,5). The additional present-day stress caused by the COVID-19 pandemic has made it even more critical to address the mental health needs of youth with diabetes and their families. In this special pediatric-themed issue of the *Canadian Journal of Diabetes*, we present a series of articles that underscore the significant role mental health and adverse psychosocial factors play in diabetes care. The studies further highlight the importance of identifying and addressing the mental health needs of children, youth and their families.

As demonstrated by Monaghan et al, mental health disorders among adolescents and youth with type 2 diabetes are common and frequently not addressed (6). Approximately 19% had elevated depressive symptoms and, among a subsample, 18.9% endorsed thoughts of self-harm. The rates of depressive symptoms in adolescents and youth with type 2 diabetes were twice those of adolescents and youth with type 1 diabetes assessed in the same clinics. Another concerning finding of their study is that a significant portion of adolescents and youth with elevated scores did not have a documented mental health referral in their medical charts. Of note, 20% of adolescents and youth endorsing the harm-to-self item did not have a documented referral for mental health treatment and only 10% were in active mental health treatment. These results underscore the importance of routine screening for mental health disorders, particularly for adolescents and youth with type 2 diabetes, and the need for appropriate referral services and adequate access to mental health follow-up resources in pediatric diabetes care.

Anxiety is a prevalent mental health concern for children and youth with type 1 diabetes; 18% will be diagnosed with an anxiety disorder before adulthood and having an anxiety disorder is associated with higher glycated hemoglobin (A1C) levels (7).

Vesco et al (8) report that diabetes distress mediates this association between anxiety and A1C, suggesting that targeted strategies addressing diabetes distress are needed (9). In addition to anxiety, decreased quality of life and stigma are also associated with suboptimal glycemic control. The use of advanced diabetes care technology, particularly continuous glucose monitoring systems and insulin pumps, may ameliorate some psychosocial adversity. For instance, in the qualitative study by Haynes et al, parents of young children report improved quality of life and “peace of mind” in managing their young child’s diabetes with insulin pump therapy compared with injections (9). Across all age groups, including adolescents and youth, pump use was reported to help them feel more “normal” and reduce diabetes-associated feelings of shame or stigma. However, not everyone has access to these technologies or can optimally use them; as highlighted by Shulman et al, the social determinants of health are major barriers to technology access and uptake (10).

The mental health impact of diabetes is felt not only by children and youth but also by their caregivers who also have higher levels of anxiety and lower quality of life compared with caregivers of children without diabetes (11). Among parents of children with type 1 diabetes, Abitbol and Palmert found that parental anxiety and/or fear of hypoglycemia are barriers to optimal diabetes care and to parental engagement with the care recommendations provided by their diabetes team (12). Higher scores on the Hypoglycemia Fear Survey—Parent Version were associated with parents being more likely to give smaller doses of insulin than suggested ( $p < 0.001$ ) and more reluctant to make the suggested insulin dose increases ( $p = 0.032$ ).

The findings presented in this issue add to the evidence that children and youth with diabetes and their families are vulnerable to mental health difficulties. The burden of living with diabetes and its management, the fear of complications and the fear of hypoglycemia can lead to considerable distress and increased mental health disorder risks. These needs must be addressed by qualified mental health services. The 2018 ISPAD Clinical Practice Consensus Guidelines recommend that: “Mental health professionals should be available to interact not only with patients and families at clinic visits to conduct screening and more complete assessments of psychosocial functioning, but also to support the diabetes team in the recognition and management of mental health and behavior problems” (13). The 2018 Diabetes Canada Clinical Practice Guidelines echo similar guidelines recommending that children with type 1 diabetes and their families be screened regularly for psychosocial or psychological disorders (14). The Diabetes Canada guidelines also recommend regular

screening for depression and disordered eating in children and youth with type 2 diabetes (15). Psychological support should include routine assessments, screening and delivery of effective interventions. However, gaps in mental health care access and psychological support persist as major problems. The articles in this issue provide further evidence that we must be persistent in our advocacy to prioritize mental health supports and provide timely access to children and youth with diabetes and their families. Intervening early and focusing on mental health will improve outcomes down the road (4). It is truly time to embed and integrate mental health care into routine diabetes care to address the barriers that poor mental health creates to better diabetes management and to improve the mental health and outcomes of our children, youth and their caregivers (16).

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## Author Disclosures

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