

# "Toddler Tips" for Diabetes Care Providers: Managing Type 1 Diabetes in Children 5-Years and Under VIDEO OVERVIEW

# **Purpose of the Video Resource**

This video series is intended to support and increase the capacity of pediatric diabetes teams, inclusive of pediatricians and nurse/dietitian diabetes educators, to provide care to young children ( $\leq$  5 years) with type 1 diabetes. Drawing on the expertise and experience of the IWK Pediatric Diabetes Team, the videos provide an overview of the approach to diabetes care in this age group. Practical strategies and tips to facilitate care, manage behaviors, and promote cooperation with treatment are also shared.

## **Video Series**

Module 1: Approach to Therapy 14:02 Web Link:	https://youtu.be/xcg6k69N-TQ
Module 2: Practical Strategies 8:52 Web Link:	https://youtu.be/4G8sngi1pOk

# Cast

The following individuals are featured in the video series (2 Modules):

- Charlie, 4-year old with type 1 diabetes, and her mother, Kate
- Rebecca D'Entremont, MSW RSW, IWK Health Centre
- Laurel Fry, PDt CDE, IWK Health Centre
- Megan Kean, RN CDE, IWK Health Centre
- Dr. Arati Mokashi, Pediatric Endocrinologist, IWK Health Centre
- Lorianne Peach, RN CDE, IWK Health Centre
- Dr. Teresa Pinto, Pediatric Endocrinologist, IWK Health Centre

# Module 1: Approach to Therapy (14:02)

Web link: https://youtu.be/xcg6k69N-TQ

This module provides an overview of the approach to diabetes management in children 5-years and under. Dr. Mokashi provides an opening statement. Module topics include:

#### a) Treatment Goal:

• Dr. Pinto explains that the principles of diabetes management in young children are similar to those in older children, with a goal of minimizing both hypo- and hyperglycemia.

#### b) Glycemic Targets:

- Megan describes the glycemic targets outlined in Diabetes Canada 2018 Clinical Practice Guidelines for children ≤ 18 years.
- Megan and Lorianne discuss the importance of individualizing blood glucose targets for young children:
  - Megan describes the preprandial and 2-hr postprandial blood glucose targets endorsed by the IWK Pediatric Diabetes Team for children ≤ 5 years.
  - Lorianne discusses scenarios that may warrant further individualization of targets.
- Megan describes the overnight (11pm and 3am) blood glucose targets endorsed by the IWK Pediatric Diabetes Teams to reduce the risk of nocturnal hypoglycemia.



# c) Insulin Dosing & Regimens:

- Dr. Mokashi discusses the lower insulin requirements of children ≤ 5 years and strategies to administer these small doses.
- Megan describes the TID insulin regimen as a commonly-used approach in children ≤ 5 years.
- Dr. Mokashi describes the challenge of reducing an insulin dose (for activity or illness) for young children already on very small doses and provides management suggestions.

### d) Bolus Insulin Dosing:

- Laurel discusses how consistency with carbohydrate intake can facilitate bolus insulin dosing. She also describes the challenge of using insulin-to-carb ratios in this age group.
- Lorianne provides suggestions for bolus insulin timing and dosing when there is inconsistency with carbohydrate intake, which is typical in young children.

# e) Minimizing & Treating Hypoglycemia:

- Dr. Pinto provides suggestions to help address parents' fear of hypoglycemia.
- Dr. Mokashi discusses the role of glucose sensors and insulin pump therapy in minimizing the risk of hypoglycemia.
- Laurel reviews the treatment of mild-to-moderate hypoglycemia in young children.

## f) Illness:

- Dr. Mokashi and Lorianne discuss how young children are more likely to experience hypoglycemia during illness relative to older children. The potential for starvation ketones in this age group is also discussed.
- Suggestions for extra carbohydrate during illness are provided.

## g) Worries & Anxieties of Parents:

• Rebecca describes the emotional and practical considerations that many parents of newly diagnosed young children with T1DM have. She suggests resources for parents.

# **Module 2: Practical Strategies (8:52)**

Web link: https://youtu.be/4G8sngi1pOk

Members of the IWK Pediatric IWK Diabetes Team share practical tips and strategies to facilitate diabetes management in young children. Dr. Mokashi provides a closing statement. Module topics include:

#### a) Blood Glucose Checks and Insulin Injections:

- Megan describes strategies to reduce potential fear/anxiety associated with these activities and to promote cooperation.
- Lorianne reviews various strategies with Kate, mother of 4-year old Charlie who performs her own blood glucose check.

# b) Demonstration: How to Hold a Child for a Blood Glucose Check

• Lorianne demonstrates helpful techniques with Charlie

### c) Demonstration: How to Hold a Child for an Insulin Injection

Lorianne demonstrates helpful techniques with Charlie

## d) Avoiding Picky Eating Behaviors:

 Laurel describes the challenge of fulfilling best practice in diabetes management without perpetuating picky eating behaviors. She provides suggestions to minimize picky eating.

#### e) A Parent's Perspective:

Kate describes the "balancing act" of managing diabetes in a young child.