

Thinking of starting insulin?

Canadian Diabetes Association

CPG
Clinical Practice Guidelines

management

Many medications are used to manage diabetes, but the one that most people have heard about is insulin. If you are thinking of starting insulin, here are some things you will want to know.

What is insulin?

Insulin is a hormone produced by the pancreas to control the amount of glucose (sugar) in the blood. Without insulin, glucose builds up in the bloodstream. This can lead to serious health problems, such as blindness, heart disease, kidney problems, amputation, nerve damage, and erectile dysfunction.

Looking forward to good health

If this seems like a lot to learn, don't worry – your diabetes healthcare team will work with you to ensure that you understand how to use insulin effectively.

What happens in diabetes?

Type 1 diabetes

The pancreas is no longer able to make insulin. As a result, people diagnosed with type 1 diabetes will need to start on insulin immediately and take it for life. Insulin is given either with multiple daily injections using insulin pens or syringes or by using an insulin pump.

Type 2 diabetes

The pancreas no longer produces enough insulin or the body is not able to use its own insulin effectively. If you have type 2 diabetes, you may be able to keep your blood glucose levels in your target range through healthy eating, physical activity, and by taking diabetes medication. Ask your doctor to refer you to a diabetes educator (nurse, dietitian, or pharmacist) who can help you with lifestyle changes and managing your blood glucose levels. Type 2 diabetes is a progressive condition and, over time, many people will need to use insulin to manage their blood glucose.

How do I feel about starting insulin?

Sometimes people feel scared, nervous, or guilty about having to start insulin therapy, and that's okay. Taking insulin to help manage your diabetes may be hard to understand and you might be scared of taking injections. What is important to remember is that using insulin can help you to reach your blood glucose targets and prevent complications related to diabetes.

Types of insulin

Several different types of insulin are available. Types of insulin differ by how long they work, how quickly they start working, and when they are most effective. By understanding how your prescribed insulin works, you can time your meals, snacks, and activity levels.

You might start on one or more injections each day. Your diabetes educator can work with you to find an insulin treatment that will work well with your lifestyle while helping you to achieve good blood glucose levels.



When prescribing insulin for you, your diabetes healthcare team will consider several factors, such as your treatment goals, age, lifestyle, meal plan, general health, plus risk and awareness of low blood glucose (hypoglycemia). There is no “one size fits all” plan.

When you take insulin, you need to check your blood glucose levels regularly. Regular checks give you important information about how your glucose levels vary during the day, how much insulin you need, and help you determine if you're on track managing your diabetes. Understanding and acting on the results of your blood glucose checks is the best way to keep your glucose levels in their target range.

Your healthcare team will talk with you about the best insulin plan to meet your needs. Remember, it will take time to fine-tune your insulin routine, and it may change over time depending on life events (such as a major illness) or changes in your lifestyle (such as a change in physical activity).

How do I take insulin?

You can take insulin with pens, syringes, or pumps according to your personal preference. Newer devices and shorter needle lengths are available to make taking insulin easier.

Talk to your doctor or diabetes educator about which device is right for you.

Insulin pens are loaded with a cartridge that contains insulin. They are convenient, easy to carry, and ensure accurate dosing. A needle tip is added. You will need a separate insulin pen for each type of insulin you use. If you need to use two types of insulin at the same time, you will need two separate pens and give yourself an injection from each pen.

Syringes today are smaller than ever and have finer needles with special coatings so injecting is as painless as possible. If you need to use two types of insulin at the same time, and they are not available in a premix formula, you can mix the insulin and give yourself only one injection.

Insulin pumps are a safe, effective way to deliver insulin and are most often used by people who need multiple injections of insulin for their diabetes. The device involves a small catheter, which is inserted under the skin, and a pump, which is about the size of a pager, that is worn outside the body.



Across the country, the Canadian Diabetes Association is leading the fight against diabetes by helping people with diabetes live healthy lives while we work to find a cure. Our community-based network of supporters help us provide education and services to people living with diabetes, advocate for our cause, break ground towards a cure and translate research into practical applications.



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