

FROM THE OFFICE OF DR.

# Hypoglycemia

Hypoglycemia, or low blood sugar, happens when there is not enough sugar in your body. You may also have heard hypoglycemic reactions called "insulin reactions." Hypoglycemia can occur only if you take insulin or an oral diabetes medication to manage diabetes. People who control their blood sugar levels only through diet and exercise do not develop hypoglycemia.

#### Causes of hypoglycemia

- Missing a meal or not eating the whole meal
- More exercise than usual
- Not eating when ill
- Eating later than usual
- Taking too much diabetes medication (insulin or oral diabetes medication)
- Drinking alcohol

# Symptoms of hypoglycemia

Most people feel symptoms of hypoglycemia when their blood glucose level is 70 mg/dL or lower. (Glucose is the type of sugar that the cells of the body use.)

Each person may have different symptoms of hypoglycemia. You will learn to recognize your own symptoms.

### Early symptoms

- Confusion
- Dizziness
- Feeling shaky
- Hunger
- Headaches
- Irritability
- Pounding heart
- Pale skin
- Sweating
- Trembling
- Weakness

#### Late symptoms

- Headache
- Feeling irritable
- Poor coordination
- Poor concentration
- Numbness in mouth and tongue
- Passing out
- Coma
- Nightmares or bad dreams







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# How to treat hypoglycemia

When you have symptoms of hypoglycemia:

- 1 Check your blood glucose level.
- 2 If your blood glucose is less than 65 or 70 mg/dL, or if you have symptoms of hypoglycemia, eat a glucose-containing food, such as one of the following (eat only one of the foods listed, in the amount given):
  - Two or three glucose tablets or glucose gel (available at drug stores)
  - 4 to 6 pieces of hard candy (not sugarfree)
  - 1/2 cup orange or apple juice
  - 1 cup skim milk
  - 1/2 cup soft drink (not sugar-free)
  - 1 tbsp honey
  - 1 tbsp brown sugar
  - 1 tbsp corn syrup
- 3 Fifteen minutes after you have eaten one of the above choices, check your blood glucose. If your blood glucose is less than 70 mg/dL, or if you have symptoms of hypoglycemia, eat another serving of one of the above choices. If it is more than 45 minutes until your next meal, eat a more complex snack such as a peanut butter sandwich or cheese and crackers
- **4** Keep a record of the date and time of day your reaction occurred and what you did.

- 5 Call your doctor if you have more than one unexplained hypoglycemic reaction in a week.
- 6 Wear a medical identification tag (for example, Medic Alert) and/or carry an identification card that states that you have diabetes.
- 7 Hypoglycemia may cause you to pass out. If so, you will need someone to give you a glucagon injection. It is important that your family members and friends know how to give the injection in case you have a low blood glucose reaction. Talk with your doctor, nurse, or diabetes educator about the use of glucagon.

Note: it is very dangerous to drive during a low blood glucose reaction. If you are driving and you experience symptoms of hypoglycemia, safely pull off the road and eat a glucose-containing food. Wait at least 15 minutes and repeat treatment if necessary before continuing to your destination. It is important to keep a glucose source and more complex snack in your car for emergencies.

Two oral diabetes medications—acarbose (Precose) and miglitol (Glyset)—work by slowing down how your body breaks down food into glucose. If you are taking one of these medications and you develop hypoglycemia, take glucose tablets or gel—food may work too slowly.

# How to prevent hypoglycemia

- Follow your meal plan.
- Eat at least three evenly spaced meals each day with between-meal snacks as prescribed.
- Plan your meals no more than 4 to 5 hours apart.
- Exercise 1/2 to 1 hour after meals.
- Double-check your insulin and oral glucose-lowering-medication dose before taking it.
- Know when your medicine is at its peak level.
- Carry a glucose source with you at all times. It is important to keep a glucose source in your car for emergencies.
- Test your blood glucose as often as directed by your health care provider.