Hypoglycemia (Insulin Reaction)

What is hypoglycemia?
Hypoglycemia (low blood sugar) is the term used for when you have too little sugar in your blood. Other terms are "insulin-reaction", "lows" or "hypo."

How does it occur?
People with diabetes have hypoglycemia if their dose of insulin or other blood sugar medication doesn't balance with their food or activity. Some causes of abnormally low blood sugar levels are:

- being more physically active than usual
- missing a meal
- eating later than usual
- eating less food than usual
- taking more insulin or diabetes pills than usual
- taking insulin or diabetes pills at a different time than usual

What are the symptoms?
The symptoms of low blood sugar range from mild to severe. Watch for the following symptoms that can result from low blood sugar:

- mild symptoms
  - dizziness
  - irritability
  - hunger but no thirst
  - shakiness
  - sweating
  - rapid heartbeat
• moderate symptoms
  o confusion
  o headache
  o poor coordination
• severe symptoms
  o unconsciousness
  o seizures
  o coma

Never drive when your blood sugar is low.

What is the treatment?

You need to drink or eat some form of sugar as soon as you have any symptoms of hypoglycemia. Symptoms will become worse if not treated.

If you have mild or moderate hypoglycemia:

• The following amounts and types of foods will bring your blood sugar level up:
  o 3-4 glucose tablets (you can buy these at your drugstore)
  o 1/2 cup orange juice
  o 1/3 cup apple juice
  o 1/4 to 1/3 cup of raisins
  o 2 large or 6 small sugar cubes in water
  o 4 to 6 ounces of regular soda
  o 1/3 to 1/2 a tube (30 grams) of glucose in gel form
  o 1 tablespoon of molasses, corn syrup, or honey.

• If you still have symptoms or your blood sugar is still low 15 minutes after eating or drinking one of the foods listed above, you need to eat or drink another portion.

• If you are about to eat a meal, treat the reaction first and then eat the rest of your meal.
If you have severe hypoglycemia that is causing seizures or unconsciousness, 911 should be called for emergency treatment. Your family or friends can learn to give an injection of a hormone called glucagon that will raise your blood sugar.

**How long will the effects last?**
The effects of low blood sugar will continue and worsen until treated.

**How can I prevent hypoglycemia?**
You can help prevent hypoglycemia by following these guidelines:

- Check your blood sugar level routinely and whenever you have any of the symptoms of hypoglycemia. A blood sugar of less than 70 mg/dl is considered hypoglycemia.
- Carry glucose tablets or hard candy to eat if your blood sugar gets too low.
- Keep glucose tablets or hard candy in your car in case your blood sugar gets too low.
- Wear a medical ID bracelet or carry a card that says you have diabetes.
- Teach a family member, friend, or coworker how to give you an injection of glucagon.
- Do not skip meals or eat partial meals.
- Eat extra carbohydrates if you are more active than usual.
- Check your blood sugar more often when you are exercising more, eating differently, or when you are sick.