Diabetes mellitus (MEL-ih-tus), or simply, diabetes, is a group of diseases characterized by high blood glucose levels that result from problems in the body’s ability to produce and/or use insulin.

Type 2 diabetes is the most common form of diabetes. Millions of Americans have been diagnosed with Type 2 diabetes, and many more are unaware they are at high risk. Some groups have a higher risk for developing this type of diabetes than others. Type 2 diabetes is more common in African Americans, Latinos, Native Americans, and Asian Americans, Native Hawaiians and other Pacific Islanders, as well as the older population.

**What you will learn:**
- Facts about Diabetes
- High and low blood sugar and what to look for
- Symptoms of Diabetes
- The Aide’s Role in working with a client with diabetes.

**Diabetes Facts:**
- Type 1 Diabetes is caused by genetics and unknown factors that trigger the onset of the disease
- Type 2 Diabetes is caused by genetics and lifestyle factors. Being overweight does increase your risk for developing Type 2 Diabetes, and a diet high in calories, whether from sugar or from fat, can contribute to weight gain.
- Diabetes is the 6th leading cause of death in the US
- It is the most costly disease in the US
- About 1 in every 20 people have diabetes
- Approximately 2,200 people are diagnosed with diabetes each day
- About one third of all diabetics do not know they have the disease
- Diabetes is a chronic disease that has no cure
- There are treatments to help keep diabetes under control
- Blood sugar levels are above normal
- Not enough insulin being made or...the body cannot use its insulin properly

**Meals**
A healthy meal plan for people with diabetes is generally the same as a healthy diet for anyone – low in fat (especially saturated and trans fat), moderate in salt and sugar, with meals based on whole grain foods, vegetables and fruit.

Starchy foods are part of a healthy meal plan. What is important is the portion size. Whole grain breads, cereals, pasta, rice and starchy vegetables like potatoes, yams, peas and corn can be included in your meals and snacks. **The key is portions.**

For most people with diabetes, having 3-4 servings of carbohydrate-containing foods is about right. Whole grain starchy foods are also a good source of fiber, which helps keep your gut healthy.

**How Do Our Bodies Work?**
- Food that we eat is broken down in the stomach and bowels to form glucose
- The glucose is absorbed into the blood and carried to the cells in the body
- The glucose is then burned to produce energy
- Any glucose not used is stored in the cells

**Insulin and its Role:**
- Insulin is produced by the pancreas which is an organ located behind the stomach
- The insulin helps the glucose get into the body’s cells
- If there is not enough insulin, or the body does not use the insulin correctly, the glucose stays in the bloodstream
- **High levels of glucose in the bloodstream causes diabetes**
Symptoms of Diabetes

Excessive Thirst
Unexplained weight loss
Extreme hunger
Sudden vision changes
Tingling or numbness in the hands and feet
Feeling very tired much of the time
Very dry skin
Frequent urination
Sores that heal slowly
More infections than usual
Irritability, mood changes, and/or feeling edgy
Feeling sick to your stomach and vomiting
Flu like symptoms in children
Recurring skin, gum, vaginal or bladder infections

Hyperglycemia Can be caused by:
- Not taking insulin or not taking enough insulin
- The insulin in the body is not working properly
- Eating too much
- Less exercise than planned
- Stress
- Illness

Symptoms of Hyperglycemia:
- High blood sugar
- The urine has high sugar levels
- Increased thirst
- Frequent urination

Hypoglycemia can be caused by:
- Taking too much insulin
- Not eating enough
- Not eating on time
- Exercising too much

Symptoms of Hypoglycemia:
- Pale and sweating skin
- Dizziness and/or shakiness
- Headache
- Hunger
- Confusion
- Sudden mood or behavior changes
- Clumsy or jerky movements
- May appear “drunk”

Treatment for Diabetes

* Healthy Eating * Physical Activity
* Medication- Insulin injections and medications taken by mouth

Hypo (low) Hyper (high) glycemias

*When the blood sugar becomes too high or too low, serious problems can arise

*Hyperglycemia is high blood sugar
*Hypoglycemia is low blood sugar

The Aide’s Role:
- Report any signs and symptoms of diabetes to the case manager or supervisor
- Encourage the patient to follow prescribed diet
- Report any deviations from diet e.g. eating large amounts of sugary food, frequent alcohol use
- Encourage/remind patient to take medications as ordered
- Report missed medication doses to case manager
- Report any signs of improper storage of medications e.g. insulin sitting in direct sunlight or in the freezer
- Inform case manager if patient is not eating or has diarrhea, vomiting etc.
- Inform case manager if patient is “sick”
- Report any signs and symptoms of hypo/hyperglycemia immediately
- Report any new shortness of breath immediately
- Encourage patient to keep regular MD appointments
- Provide good foot care:
  - Wash feet carefully and dry between the toes well
  - Inspect feet for blisters, cuts, redness, swelling
  - Check for hot or cold feet
  - Encourage patient to wear socks and comfortable shoes and avoid bare feet
  - Avoid restrictive garters or knee high stockings
  - Avoid things that increase skin dryness such as hot water, bubble bath, scented soaps
- Use moisturizing soaps and skin cream

Bonus - National Falls Prevention Awareness Day is observed the first day of fall to promote and increase public awareness about how to prevent and reduce falls among older adults. This year Falls Prevention Awareness Day is September 23, 2010.

Everyone is at risk and risk for falls increases as we age. This increased risk of falling is likely the result of changes that come with aging, plus other medical conditions such as arthritis, cataracts or hip surgery. Let your supervisor know if you observe your client having problems with walking or dizziness or other signs that you client could fall.