

Diabetes-A “Sweet” Burden Turns Bitterly Burdensome

Diabetes Mellitus (DM), a common chronic disease, the seventh leading cause of death in the US (CDC, 2016). Characterized by elevated blood glucose, DM involves an inability to adequately process sugar. The carbohydrate portion of our food intake is broken down into the simple sugar, glucose, for our bodies to use as an energy source. The pancreas makes a hormone called insulin to help glucose get into the cells of our bodies. When you have diabetes, your body either doesn't make enough insulin or cannot use its own insulin properly. This causes sugar to build up in your blood.

In the US, the number of adults aged 18–79 with newly diagnosed diabetes more than tripled from 493,000 in 1980 to more than 1.4 million in 2014. There are 29.1 million people, or about 1 of every 11 with diabetes in the US.

Diabetes can cause serious health complications including heart disease, blindness, kidney failure, and lower-extremity amputations.



1 Foot complications

Diabetics can develop many different foot problems which left untreated tend to worsen and lead to serious complications. Most frequently, foot problems occur when nerve damage or neuropathy. The resultant tingling, burning or stinging and weakness in the foot can also cause loss of feeling in the foot, so people with diabetes can injure it and not know it. Poor blood flow or changes in the shape of your feet or toes may also cause problems.

2 Stroke

People with diabetes are two to four times more likely to have a stroke than non-diabetics. They also tend to develop heart disease or have strokes at an earlier age than people without diabetes. The connection between diabetes and stroke has to do with the way the body handles blood glucose to make energy. People with diabetes usually have too much glucose in their blood, while their cells cannot use it and are energy starved. Over time, this glucose can lead to increased fatty deposits or clots on interior blood vessel walls. These clots can narrow or block the circulation in the brain or neck, cutting off the blood supply, and preventing oxygen from getting to the brain, resulting in a stroke.

3 Kidney disease

In the kidney, millions of tiny blood vessels with even tinier holes in

them act as filters to strain out the waste products and retain useful substances in the blood. Diabetes can damage this system. High levels of blood sugar make the kidney filter too much blood. All this extra work is hard on the filters. After many years, they start to leak and useful protein is lost in the urine (proteinuria). In time, the stress of overwork causes the kidneys to lose their filtering ability. Waste products then start to build up in the blood. Finally, the kidneys fail.

4 Eye complications

You may have heard that diabetes causes eye problems and may lead to blindness. Diabetic retinopathy (DR) is a chronic progressive, potentially sight-threatening disease of the retinal microvasculature, associated with the prolonged hyperglycemia of diabetes and with other diabetes-linked conditions, such as hypertension. Other conditions associated with diabetes and the eyes include cataracts, glaucoma, and ocular motor nerve palsies.

5 Conclusion

The most detrimental aspects of DM are the complications listed above. The expensive medical treatment, also leads to an elevated death rate and affects the quality of life. Research indicates that using natural and safe nutraceutical supplements, in combination with a healthy life style and exercise can greatly prevent the health damage from diabetes and the risk of its occurrence.

Nutrients

Potential function of Nutrients

Chromium

NH Products **GlucoHealth**

Essential mineral: Main Glucose Tolerance Factor (GTF). Important factor for blood sugar metabolism. Regulates glucose level. Chromium in yeast form is the safest and non-toxic for the body.

Vitamin B complex

NH Products **B-Strong**

Co-factors of carbohydrate metabolism. Helps improve blood sugar. Improves neural damage caused by diabetes.

Green Barley

NH Products **NH Green Barley Powder**

Consists of 500 – 700 types of enzymes, chromium, and dietary fiber. Helps regulate glucose and insulin.

Multiple Antioxidants

NH Products **Prime Shield**

Vitamins C and E can improve pancreas function of secreting insulin. Combines with Vitamin A, selenium, zinc, extracts from grape seed, green tea, and cruciferous vegetables. Helps optimizes function. Reduces free radical damage.

Multivitamin & essential trace minerals

NH Products **Joy for Life**

Provides fundamental nutrients for maintaining a healthy body. With chromium to help regulate blood sugar.

Ginkgo Biloba

NH Products **Prime Ginkgo**

Assists blood sugar regulation and improves neural damage caused by diabetes, improves blood circulation, and prevents foot ulcer and amputation.