

Diabetes

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What is diabetes?

Diabetes mellitus is a disease in which your pet's pancreas can no longer produce enough of the hormone insulin.

What does insulin do?

Every time your pet eats a meal, glucose is absorbed from the intestines and enters the bloodstream. Glucose (sugar) is the essential fuel of the body's cells and is needed for these cells to work and so for the body to function. At the same time, insulin is released by your pet's pancreas. Insulin allows the glucose to leave the bloodstream and enter cells (e.g. liver, kidney, brain and muscle cells) where it can be used for energy and growth. Think of insulin as a key that unlocks a door to let glucose into the cells. Insulin lowers blood glucose and allows it to enter cells, where it is used to produce energy.

What happens with a lack of insulin?

In diabetic pets the pancreas can no longer produce enough insulin. Without insulin, glucose is no longer able to leave the bloodstream to be used as energy by the body's cells. Hence the glucose in the blood will rise to an abnormally high level. The level will become so high that glucose overflows into the urine and your pet's urine will contain glucose.

The body's cells cannot utilise the glucose they depend upon for energy. In order to compensate for this, other 'abnormal' energy producing processes start up which do not depend on glucose (such as fat break-down). Unfortunately, these processes eventually create toxic by-products that can make your pet very sick.

What signs should I look for?

Contact your veterinarian if you have any concerns about your pet.

Signs to look for are:

increased thirst

frequent urination

changes in appetite

weight loss

deteriorating coat condition

lethargy or lack of energy

Can it be treated?

Your veterinarian will discuss how diabetes can be managed depending on the extent of the diabetes. This could include dietary changes as well as considering insulin injection therapy to replace the insulin that your pet's pancreas can no longer produce.

For greater in-depth information on managing your pet's diabetes, please visit www.cat-dog-diabetes.com