

Diabetes - pre-diabetes

Pre-diabetes is a condition in which blood glucose levels are higher than normal, although not high enough to be diabetes. Pre-diabetes has no signs or symptoms.

People with pre-diabetes have a higher risk of developing type 2 diabetes and cardiovascular (heart and circulation) disease.

Higher than normal glucose levels

If you are diagnosed with pre-diabetes, you will have one or both of the following:

- **Impaired fasting glucose (IFG)** – this condition is diagnosed when the fasting blood glucose level is higher than normal, but still below the level for diabetes.
- **Impaired glucose tolerance (IGT)** – this condition is diagnosed when the blood glucose level taken after two hours as part of an oral glucose tolerance test (OGTT) is higher than normal, but still below the level for diabetes. The fasting level may be in the normal range.

Pre-diabetes can lead to type 2 diabetes

Without treatment, approximately one in three people with pre-diabetes will develop type 2 diabetes.

Type 2 diabetes is a condition in which the body can't use insulin properly or doesn't make enough insulin, or both. This leads to raised blood glucose levels. Type 2 diabetes is a serious and chronic medical condition that can lead to long-term damage of nerves and blood vessels, kidneys, heart, eyes and feet.

Symptoms

Pre-diabetes has no signs or symptoms. It is important to be aware of the risk factors and have your blood glucose levels tested by your doctor if you are at risk.

Risk factors

The risk factors for developing pre-diabetes are the same as for type 2 diabetes, and include:

- A family history of type 2 diabetes
- Being overweight or obese
- Low level of physical activity
- Smoking
- High blood pressure or abnormal blood fats (or both)
- Cardiovascular disease
- Indigenous Australian or Torres Strait Islander people
- People from some ethnic backgrounds including Middle Eastern, South Asian, Pacific Islander and North African backgrounds
- Gestational diabetes during pregnancy
- Polycystic ovarian syndrome
- Some antipsychotic medications.

Diagnosis

Pre-diabetes is diagnosed by pathology tests to check blood glucose levels. These tests may include an oral glucose tolerance test (OGTT). The results will show if blood glucose levels are in the normal, pre-diabetes or diabetes range.

Management of pre-diabetes

The main aim of pre-diabetes management is to prevent the development of type 2 diabetes and cardiovascular disease. This can be done by lifestyle changes including:

- Weight reduction – helps the body to become more sensitive to insulin and use glucose more effectively.
- Physical activity – regular moderate physical activity helps manage weight and reduce blood glucose levels. It may also improve blood pressure and cholesterol.
- A balanced diet – less fat, especially saturated fats, and more fruit, vegetables and high-fibre foods.
- Stop smoking. Smoking causes insulin resistance and increases the risk of vascular disease.
- Blood pressure and cholesterol should be checked regularly.

Follow-up

There is no benefit in testing your own blood glucose levels when you have pre-diabetes. Once you are diagnosed with pre-diabetes, your doctor will organise a repeat oral glucose tolerance test (OGTT) in 12 months, unless you develop symptoms of diabetes earlier.

Where to get help

- Your doctor
- Community Health Centre
- Diabetes Australia Victoria Tel. 13 RISK (13 7475)
- An accredited practising dietitian, contact the Dietitians Association of Australia.

Things to remember

- Pre-diabetes has no signs or symptoms and can progress to type 2 diabetes.
- If you have pre-diabetes, lifestyle changes can reduce your risk of developing type 2 diabetes.
- Risk factors for pre-diabetes include a family history of type 2 diabetes, obesity, smoking and some ethnic backgrounds.

This page has been produced in consultation with, and approved by:

Diabetes Australia Victoria

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