

Learning objectives



Module 1: Diabetes basics

Chapter 1 – Before basics

- Describe what **diabetes** is.
- Identify how the body balances blood glucose levels; **glucose homeostasis**.
- Identify the **organs involved** in balancing blood glucose levels, or glucose homeostasis, and their specific role.
- List the **hormones that affect glucose metabolism** and describe their source and their effect on balancing blood glucose levels.

Chapter 2 – Types of diabetes

- Outline the key features of **type 1 diabetes**, including the prevalence, basic causation, development, prevention, and clinical presentation.
- Outline the key features of **type 2 diabetes**, including the prevalence, risk factors, basic causation, development, prevention, and clinical presentation.
- Outline the key features of **gestational diabetes**, including the prevalence, risk factors, basic causation, prevention, and presentation.
- Outline the key features of **other types of diabetes**, including the prevalence, basic causation, presentation and management.

Chapter 3 – How diabetes is diagnosed

- Describe how **type 1 diabetes** is diagnosed, including the diagnostic tests and criteria used.
- Describe how **type 2 diabetes** is diagnosed, including the diagnostic tests and criteria used.
- State the differences in diagnostic test results that could indicate either type 1 or type 2 diabetes in **children and adolescents**.
- Describe how **gestational diabetes** is diagnosed, including the diagnostic tests and criteria used.
- Describe how **secondary diabetes** presents and relates to type 1 and type 2 diabetes.

Chapter 4 – Managing diabetes

- Describe in which ways diabetes can be **managed**.
- Recognise the **importance of self-management**.
- Understand all issues that may lead to **barriers** to self-management.
- Outline the role of the **health professionals** involved managing diabetes.

Chapter 5 – Pregnancy and diabetes

- Describe the **impact pregnancy** has on type 1 and type 2 diabetes and the management criteria.
- Describe how **preconception planning** can minimise the risk of complications for both mother and baby.
- Describe the **role of optimal blood glucose control** before conception and during pregnancy and how it is achieved.
- Outline the **potential complications and issues** that need to be considered in developing and implementing the person's management plan.

Chapter 6 – Meaningful monitoring

- List the practices necessary to **monitor** and manage diabetes, the frequency of checking and specific targets.
- Describe **key elements of Self-Monitoring Blood Glucose (SMBG)**, including timing, documenting and using results, BGL meters and technique.
- Describe **key elements of Self-Monitoring Blood Glucose (SMBG)**, using continuous glucose monitoring (CGM) and flash monitoring.
- Outline the characteristics of checking **glycated haemoglobin (HbA1c)** and **fructosamine**, how it's measured and what could interfere with the result.

Module 2: Living with diabetes

Chapter 1 – Lifestyle – Nutrition

- Recognise **why** monitoring of diet and weight and lifestyle management are important.
- Recall what an **Accredited Practicing Dietitian (APD)** is and does, and how often a person with diabetes should be assessed by them.
- Identify the **Australian Dietary Guidelines** for Adults as the basis for dietary advice.
- Describe how to **achieve and maintain a healthy weight**.
- Describe how to best include **carbohydrates** as part of a healthy diet
- State some of the **basics of food planning** and the role of the Dietitian.
- Describe how to read food labels.

Chapter 2 – Lifestyle – physical activity

- Outline the role physical activity plays in the **prevention and management** of diabetes.
- Describe the different **types of physical activity** and their benefits.
- Describe the different **intensity types**, and why and how to measure them.

- Describe the **exercise guidelines** and recommendations for a person with diabetes.
- Describe how exercise can lead to **hypoglycaemia and hyperglycaemia** and which precautions to take before and after exercise.

Chapter 3 – Medication used to manage diabetes

- Describe the **glucose lowering agents** currently available in Australia, their main action, common side effects and contraindications for use.
- Identify which **glucose lowering agents might be used to treat type 1, 2 and gestational diabetes**.
- Describe the key features of **injecting and storing insulin**.
- Recall that a person with type 2 diabetes commencing insulin may be confused about the **type of diabetes** they have; the person still has type 2 diabetes, on insulin - NOT type 1 diabetes.

Chapter 4 – Understanding hypoglycaemia

- Describe what **hypoglycaemia** is, who is at risk and what the signs and symptoms are.
- Describe the **causes** of hypoglycaemia.
- Give an outline of **treatment** for mild to moderate hypoglycaemia and for severe hypoglycaemia.

Chapter 5 – Understanding hyperglycaemia

- Describe why hyperglycaemia occurs.
- Identify the signs and symptoms of mild to moderate hyperglycaemia.
- Identify the signs and symptoms of moderate to severe hyperglycaemia.
- Identify the difference between diabetic ketoacidosis (DKA) and hyperglycaemia hyperosmolar state (HHS).
- Recall the causes of diabetic ketoacidosis (DKA).
- Recall the causes of hyperosmolar hyperglycaemic state (HHS).
- Describe their role in helping a person with diabetes look after hyperglycaemia.

Chapter 6 – Sick days and surgery

- Describe why **ill health and surgery** can affect blood glucose levels.
- Identify what to include in a **sick day management plan**.
- Describe their role in **helping** a person with diabetes **prior to surgery**.

Chapter 7 – Travel

- Recall the **legislation** as it applies to people with diabetes **obtaining a driver's license**.
- Outline the **role of the diabetes health care team** in preparation for travel.

Chapter 8 – Impact of diabetes on life

- Outline some of the ways that diabetes has an **emotional and psychological impact** on the individual, their family and their lifestyle.
- Describe how **diabetes distress, burnout, anxiety and depression** can impact on the person's self-management including family and supporters.
- Identify **support services** and organisations.

Module 3 Screening for complications

Chapter 1 – Screening for complications

- Outline the main measures to **prevent the onset of complications** related to diabetes.
- Describe the **screening schedule** for diabetes-related complications including the annual cycle of care.
- Describe the **referral pathways** to members of the diabetes health care team including the Chronic Disease Management funding opportunities for people with diabetes.

Chapter 2 – Microvascular complications

- Indicate the parts of the body most at **risk of microvascular damage** as a result of diabetes.
- Outline the prevention, detection and treatment of microvascular damage **to the eye**, including when to refer the person to another health professional.
- Outline the prevention, detection and treatment of microvascular damage **to the kidneys**, including when to refer the person to another health professional.
- Outline the prevention, detection and treatment of microvascular damage **to the nervous system**, including when to refer the person to another health professional.
- Outline the prevention, detection and treatment of microvascular damage **to the feet**, including when to refer the person to another health professional.
- Describe the **risks of physical activity** for a person with microvascular diabetes complications and how to reduce them.

Chapter 3 – Macrovascular complications

- Indicate the parts of the body most at **risk of macrovascular damage** as a result of diabetes.
- Outline the prevention, detection and treatment of macrovascular damage **to the heart**; cardiovascular disease, including when to refer the person to another health professional.
- Outline the prevention, detection and treatment of macrovascular damage **to the brain**; cerebrovascular disease, including when to refer the person to another health professional.
- Outline the prevention, detection and treatment of macrovascular damage **to the feet**, including when to refer the person to another health professional.
- Describe the **risks of physical activity** for a person with macrovascular diabetes complications and how to reduce them.

Module 4 Conditions related to diabetes

Chapter 1 – Metabolic syndrome

- Outline the key features of **metabolic syndrome**, including the prevalence, risk factors, cause, prevention, presentation and management.
- Describe how metabolic syndrome is related to **Impaired Fasting Glucose (IFG)** and **Impaired Glucose Tolerance (IGT)**.
- Outline the **criteria for diagnosing** metabolic syndrome, IFG and IGT.
- Describe how metabolic syndrome, IFG and IGT can be **prevented and managed**.

Chapter 2 – Conditions related to diabetes

- Outline the **key features** of **PCOS**, including the prevalence, basic causation, presentation and management.
- Describe **the link** between, and the medical implications of, PCOS, insulin resistance and diabetes.
- Describe how PCOS can be **managed**.