

PROTEIN



What is it? Protein is one of the major nutrients that the body requires in adequate amounts every day. Proteins are made up of 'building blocks' called amino acids. There are 21 amino acids that are arranged in different ways to make the proteins found in foods, and the proteins that are made by the body. Many of these amino acids are essential, meaning that the body cannot make them and they must be supplied from the diet. A protein that contains all of the essential amino acids, it is considered a complete protein. Soy and all animal sources of protein are complete. If one or more of the essential amino acids is missing, then the protein is considered incomplete. With the exception of soy protein, vegetable sources of protein are considered to be incomplete. But, when a range of incomplete plant proteins is consumed, it is generally not difficult to provide the body with all the essential amino acids.

What does it do? Protein has many important functions in the body. One of the primary roles of protein is to manufacture important body structures including muscles, organs, skin and hair. Hormones and enzymes are vital proteins that help the body perform various functions, and are manufactured from the amino acids supplied from dietary protein.

Why is it important? Without adequate protein, the body would not be able to grow, or to repair everyday wear and tear on muscle tissue. The hormones, enzymes and other specialized body proteins that are made by the body from the proteins in food are necessary to survival. If protein intake is inadequate, the body may begin to break down body tissues to provide the amino acids that are needed to maintain body functions.

Where is it found? Protein in the diet is supplied from animal sources (meat, fish, poultry, eggs and milk) as well as plant sources (legumes, nuts and whole grains). Protein powders, made from a variety of protein sources, can also be added to other foods to boost protein content.

How much is needed? Daily protein needs depend on an individual's age, body size and composition, fitness level and lifestyle. A large, physically active male might need between 100g and 200g of protein per day, while a small female might only need 75g to 100g of protein per day.