# The factors caused by malnutrition and its state of deficiency.

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## Abstract

Malnutrition and illness can be the result of poor dietary intake, chronic health conditions, acute health conditions, medications, changes in nutrient metabolism, or a combination of these factors, and can result in changes in macronutrients and micronutrients in the body. Malnutrition occurs when the body does not get enough nutrients such as vitamins and minerals. Many diseases are caused by malnutrition. The body needs vitamins to stay healthy and function properly. Many nutrients are important for overall health. The body absorbs most of these from certain foods. However, the typical American diet, which is high in grains, sugar, saturated fat and low in fruits and vegetables, lacks certain vitamins and minerals that are essential for many bodily functions. A nutrition report by the Centres for Disease Control and Prevention found that nearly 10% of the US population suffers from malnutrition. General malnutrition varies by age, gender and race/ethnicity and can reach one-third of her in a given population.

Keywords: Vitamins, Malnutrition, Macronutrients, Micronutrients.

## Introduction

## Malnutrition

Although this article focuses on the so-called diseases of civilization, such as heart disease, stroke, cancer, and diabetes, the most important diet-related illness is the chronic disease that affects more than 925 million people worldwide. Malnutrition is the condition of not having enough food to meet energy needs. Key features include weight loss, failure to grow, and wasting of body fat and muscle mass. Low birth weight, delayed growth and development in children, reduced intellectual capacity, and increased vulnerability to disease are among the many causes of chronic hunger that affect poor people in both developed and developing countries. Asia has the highest number of chronically hungry people, but the severity of hunger is highest in sub-Saharan Africa. At the beginning of the 21st century, about 20,000 people, mostly children, died every day from preventable malnutrition and related diseases. Many of these children die due to lack of opportunities due to maternal malnutrition and poverty [1].

## Deficiency due to malnutrition

**Iron:** Iron is an important mineral found in every cell of the body. The body needs it to make the oxygen-carrying protein haemoglobin found in red blood cells and myoglobin found in muscles. According to the CDC, iron deficiency is most common in young children, women of childbearing age, and pregnant women, and can lead to growth retardation in children and premature birth in pregnant women. Iron deficiency leads

to anaemia, a condition in which the blood lacks enough healthy red blood cells. Mild forms of anaemia often go undiagnosed for a long time, but more serious anaemia can cause fatigue, pale skin, Symptoms include nail brittleness and headaches. Treatment depends on severity and often requires taking iron supplements. Iron-rich foods include liver, oysters, red meat, sardines, spinach, broccoli, and fortified foods [2].

**Carbohydrate:** In most situations, there is no absolute need for carbohydrates, including simple sugars, complex carbohydrates such as starches, and indigestible plantbased carbohydrates known as fibre, requires the simple carbohydrate glucose for fuel. When dietary carbohydrates are inadequate, glucose synthesis depends on the breakdown of amino acids, which are derived from the body and dietary proteins, and the compound glycerol, which is derived from fat. Carbohydrates a long-term deficiency of ketones increases the production of organic compounds called ketones (a condition known as ketosis) that gives your breath a distinctive sweet smell [3].

**Iodine:** Iodine is essential for the production of thyroid hormones, which are essential for many bodily processes, including regulating calorie burn, affecting heart rate and body temperature, and regulating skin turnover and brain health. Iodine cannot be made by the body and can only be obtained from food or supplements. Common dietary sources of iodine include cheese, milk, eggs, iodized salt, and soy milk. These locations include flood-prone mountainous areas and river valleys [4].

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**Essential fatty acids:** There is also a minimum requirement for fat. Not total fat, only the fatty acids linoleic acid (a so-called omega-6 fatty acid) and alpha-linoleic acid (an omega-3 fatty acid). Deficiency of these two fatty acids has been observed in hospitalized patients, patients with medical conditions that interfere with fat absorption, low-fat infants, and low-fat infants who received only fat-free IV fluids intravenously for many weeks. Symptoms of deficiency are dry skin, hair loss, and impaired wound healing [5].

**Extreme hair loss:** Losing about 100 hairs a day is perfectly normal, but extreme hair loss is a warning sign of nutritional deficiencies. By the age of 50, 50% of adults will experience hair loss.

If you find clumps of hair in your pillows or drains, it may indicate a health risk. Consuming the following nutrients can help improve hair loss and health.

- Iron
- Zinc
- Niacin (vitamin B3)
- Biotin (Vitamin B7)
- Linoleic acid (LA)
- Alpha-linoleic acid (ALA)
- Dry, scaly patches/dandruff

Many foods can help with hair loss, including fish, meat, eggs, nuts, seeds, and whole grains. Seborrhoea dermatitis is characterized by dry, scaly patches and scales, most commonly found on the scalp. This is a common skin condition that affects oil-producing areas of the body. This condition is common in infancy but affects 50% of her adults at some point in her life.

#### Conclusion

The traditional symptoms of vitamin insufficiency are

unreliable markers for early treatment or prevention of at-risk alcoholic patients and only appear in conditions of profound depletion. Post-mortem studies show that in 80-90% of these patients, thiamine shortage insufficient to result in irreparable brain damage was not identified ante mortem. Reviewing the root causes of vitamin insufficiency, particular focus is placed on how malnutrition in alcoholic patients or ethanol's direct effects on intestinal transit limit oral thiamine hydrochloride absorption in humans. Damage to the patient's brain, liver, gastrointestinal system, and pancreas worsens as the patient's condition worsens from alcohol abuse. The likelihood of an unaided recovery is further decreased by decreased intake, malabsorption, diminished storage, and impaired use. The ineffectiveness of high oral dosages of thiamine hydrochloride to treat Wernicke's encephalopathy highlights the necessity of repeated parenteral therapy administered un appropriate doses to replenish the brain's depleted thiamine levels.

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