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Calcium

How much calcium is enough? We will give you an overview of the recommended daily amounts and a rough idea of how much calcium you consume per day.

You can also use our online calcium calculator to find out roughly how much calcium you are getting per day. Click here (URL: <http://www.informedhealthonline.org/index.420.en.html>) to try it out. The calculator is not suitable for children or women who are pregnant or breastfeeding.

It is generally recommended that adults should consume 1,000 milligrammes (mg) of calcium per day. According to the World Health Organization (WHO), women after menopause and men who are older than 65 need a higher daily calcium intake of 1,300 mg.

There are special recommendations for children, pregnant women and breastfeeding women. It is believed that pregnant women need up to 1,200 mg per day, and women who are breastfeeding need between 1,000 and 1,200 mg per day. The daily calcium requirements of children depend on their age, ranging from between 220 and 300 mg for babies and up to 1,300 mg for teenagers.

A calcium-rich diet can provide us with enough calcium to get to the recommended level. Particularly good sources of calcium include cow's milk, yoghurt, cheeses like gouda and emmental cheese, green vegetables such as spinach leaves and broccoli, as well as calcium-rich mineral water (more than 150 mg calcium per litre). Dairy products made from low-fat cow's milk have a lot of calcium in them too. Some food products, such as certain breakfast cereals and juices, are fortified with calcium. And there are dietary supplements containing calcium too.

Some people are afraid of unintentionally consuming too much calcium, but up to 2,500 mg per day is okay. If you consume a lot more than that, you are not doing yourself any favours. In fact, there is some evidence that a calcium intake far above the upper limit of 2500 mg per day can increase the risk of, for example, kidney stones. You can read more about that in our fact sheet (URL: <http://www.informedhealthonline.org/index.423.en.html>).

To give you an idea of how you can cover your calcium requirements with the right diet, here are a few examples:

There are 1,000 mg of calcium in:

2 slices of rye bread or whole grain bread

+ 2 slices of gouda, edam or emmental cheese
 + 1 serving of broccoli
 + 2 glasses of mineral water
 + 1 pot of yoghurt (200 g)

or

2 glasses of milk (200 ml each)
 + 2 slices of rye bread or whole grain bread
 + 2 servings of camembert cheese
 + 1 serving of spinach leaves

or

1 pot of yoghurt (200 g)
 + 1 serving of muesli (50 g)
 + with milk (100 ml)
 + 1 slice of rye bread or whole grain bread
 + 1 slice of gouda, edam or emmental cheese
 + 1 serving of green cabbage
 + 1 glass of mineral water

There are 1,300 mg of calcium in:

1 big pot of yoghurt (500 g) or half a litre of milk
 + 2 slices of rye bread or whole grain bread
 + 2 slices of gouda, edam or emmental cheese
 + 1 serving of spinach leaves or green cabbage
 + 1 glass of mineral water

If you do not drink cow's milk or eat dairy products made from cow's milk, it will be considerably more difficult for you to get enough calcium in your diet. In that case, suitable sources of calcium would include green vegetables like spinach leaves, green cabbage, fennel and broccoli, as well as soy milk, nuts, calcium-rich mineral water and food products that are fortified with calcium.

This table can help you to calculate roughly how much calcium you get in a typical day:

| Food product | Serving size | Calcium in mg/serving |
|---|--------------|-----------------------|
| Cow's milk and dairy products made from cow's milk | | |

| | | |
|------------------------------|------------------|------|
| Cow's milk, Kefir | 200 ml (1 glass) | 240 |
| Yoghurt | 200 ml (1 pot) | 260 |
| Gouda or edam cheese | 30 g (1 slice) | 240 |
| Emmental or alpine cheese | 30 g (1 slice) | 330 |
| Camembert cheese | 30 g | 150 |
| Parmesan cheese | 30 g | 360 |
| Brie cheese | 30 g | 84 |
| Sheep's cheese, Feta cheese | 30 g | 135 |
| Vegetables | | |
| Broccoli (cooked) | 110 | 123 |
| Spinach leaves (cooked) | 210 g | 313 |
| Green cabbage (cooked) | 160 g | 283 |
| Bread, muesli | | |
| Rye bread, whole grain bread | 1 slice | 10 |
| Muesli | 50 g | 25.5 |
| Breakfast cereals | 50 g | 80 |
| Drinks | | |
| Natural mineral water | 200 ml | 70 |
| Soy milk | 200 ml | 212 |

Author: German Institute for Quality and Efficiency in Health Care (IQWiG) in cooperation with the Robert Koch Institute

For example, one pot of yoghurt (200 ml) contains about 260 mg calcium and one serving of cooked spinach contains about 313 g calcium.

Please note that this table only includes food products that have a particularly large amount of calcium in them. A lot of other food products contain calcium too and contribute to your total calcium intake, but usually to a lesser extent.

Dietary supplements are not included in the table. If you are taking a supplement that contains calcium, that will increase your calcium intake accordingly.

If you are finding it hard to get enough calcium in your diet, calcium supplements could be an option. In our fact sheet <http://www.informedhealthonline.org/index.383.en.html> (URL: <http://www.informedhealthonline.org/index.383.en.html>) on dietary supplements and complementary medicines, you can read about important things to take into account if you are considering taking a dietary supplement.

Glossary

calcium

Calcium is an important mineral for human health. It is one of the building blocks for bones and teeth, and it is necessary for blood clotting, the muscles and the nerves. Calcium occurs in milk and milk products, as well as in green leafy vegetables. People can get a calcium deficiency if they have a chronic inflammatory bowel disease, as well as in pregnancy or during breastfeeding.

evidence

Evidence is what we call scientific proof from well-conducted, good-quality scientific trials that have been carefully designed to answer specific questions. Depending on the types of questions, different scientific research methods (types of study) are most appropriate to find reliable answers to these questions. Randomized controlled trials (RCTs), for example, are the best way to get reliable evidence on the effectiveness of medical treatments (interventions). This type of study, however, is not the best form of evidence for all possible questions, and does not provide the best answers to all kinds of questions, either. Epidemiological studies, for example, are very suitable for establishing well-founded proof for the spreading of a disease in the population.

World Health Organization (WHO)

The World Health Organization is a United Nations agency. Based in Geneva, it is concerned with matters of public health on an international level. Its objective is to obtain the highest possible level of health for all people worldwide. Health is understood here as being a “state of complete physical, mental and social well-being and not merely the absence of disease or infirmity”. To reach this aim the WHO develops guidelines and standards in health-related areas, coordinates activities in the fight against infectious diseases, launches global vaccination programs and analyzes health and disease data worldwide. More information is available at www.who.int.

dietary supplement

Dietary supplements (also known as food supplements or nutritional supplements) are concentrated vitamins, minerals, trace elements, fibers and/or other substances that are intended to supplement the diet. Advocates of dietary supplements claim that they have a certain, often

preventive or strengthening effect on the body. They are available as capsules, pills, powder or ampules, for example. From a legal point of view, dietary supplements rank among foods and therefore – as opposed to medications – do not need official approval. More information is available on the website of the German Federal Institute for Risk Assessment (Bundesinstitut für Risikobewertung, BfR): [To the BfR website \(in English\)](#)

Sources

German Nutrition Society (DGE), Austrian Nutrition Society (ÖGE), Swiss Society for Nutrition Research (SGE), Swiss Nutrition Association (SVE). *Reference values for nutrient intake*. First edition (German version). Neustadt: Umschau Buchverlag. 2000.

World Health Organization (WHO), Food and Agricultural Organization of the United Nations (FAO). *Vitamin and mineral requirements in human nutrition*. Second edition. Geneva: World Health Organization. 2004.

The German Institute for Quality and Efficiency in Health Care (IQWiG)

The German Institute for Quality and Efficiency in Health Care (IQWiG) was established by legislation to provide evaluations of the effectiveness, quality and efficiency of healthcare services. This includes the assessment of medicines as well as the publication of health information for consumers and patients.

Evidence basis of our health information

Our information is based primarily on systematic reviews of the effects of health care. Systematic reviews are necessary to gain an objective picture of health care. In order to do this, a clear question is formulated. Researchers then find all the relevant studies that could answer this question. They then evaluate those studies.

You can find a list of the evidence and other scientific literature on which this information is based at **www.informedhealthonline.org**

Disclaimer

This information was prepared and published by the German Institute for Quality and Efficiency in Health Care (IQWiG). It is based on the evidence and other scientific literature available at the time of publication. The information is intended for the use of patients in Germany. It is not intended to for use to diagnose illnesses and the information is not intended to substitute for medical advice.