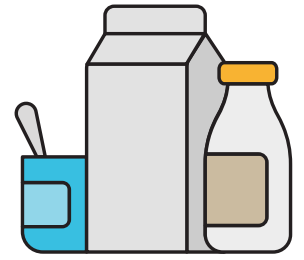


Calcium and vitamin D



Calcium helps to keep our bones strong and healthy and vitamin D helps our bodies absorb calcium from the food we eat.

Bones and teeth store 99% of our calcium. When we don't get enough calcium from food our body takes calcium from our bones.

While calcium and vitamin D are key in improving our bone health, there are also other nutrients that contribute to bone health. These include protein, manganese, magnesium, phosphorus, zinc, vitamin C, and vitamin K. A healthy balanced diet will ensure we eat adequate levels of all these bone building nutrients. Not getting enough calcium or vitamin D puts us at risk of osteoporosis (brittle, fragile bones which break or fracture more easily).

How much calcium do we need?

As we get older, our body needs more calcium. It is recommended that women over 50 and men over 70 should have 1,300mg/day. **This is equivalent to approximately 4 serves of dairy per day.**

	19 – 50 years	51 – 70 years	70+ years
Men	2.5 serves	2.5 serves	3.5 serves
Women	2.5 serves	4 serves	4 serves

Where do we get calcium from?

The main food sources of calcium are dairy products, such as milk, cheese and yoghurt. If you don't like or can't tolerate dairy products, you can replace them with plant-based and seafood sources of calcium.

Some of the content in this fact sheet is based on material provided by the National Health and Medical Research Council.

★ Tip

Did you know that oestrogen is a hormone that helps to keep bones strong? Women need more calcium than men particularly after menopause when oestrogen levels go down. Extra calcium helps to keep bones strong.

Examples of 1 serve of dairy:



250mL (1 cup) cow's milk



200g (3/4 cup) pot of yoghurt



40g (2 slices) of cheese

Examples of 1 serve of dairy alternatives:



250mL (1 cup) nut or cereal plant-based milk alternative with at least 100mg of added calcium/100mL



60g sardines, canned in water



100g canned salmon with bones



100g firm tofu (check the label as calcium levels vary)

★ Tip

Did you know prunes contain a number of bone-building nutrients not found in dairy? You could try prunes as a snack.



Vitamin D

Vitamin D is important for strong bones, muscles and overall health.

Vitamin D and sunshine

For most Australians, the main source of vitamin D is from exposure to sunlight. The amount of sun exposure required is relatively low. However many Australians do not have adequate vitamin D levels, especially during winter.

Below are some recommendations for safe sun exposure. Note that individual requirements vary based on many factors such as the season, daily weather, location in Australia, time of day, skin type and the amount of skin exposed.

UV Index of three or above

- Aim for a few minutes of mid-morning or mid-afternoon sun exposure, most days of the week on your arms and hands
- If you are outdoors for more than a few minutes, you should use sun protection such as hats, sunscreen, clothing, sunglasses and shade

UV Index below three

- Aim for a few hours of sun exposure per week during the middle of the day, with some skin uncovered
- Sun protection is not required unless you are near snow or other reflective surfaces

It is important to balance the need for sun exposure for vitamin D with avoiding the risk of skin damage.

★ Tip

You can check the UV index on the Cancer Council Website or at www.myuv.com.au

Vitamin D and food

Food can provide small amounts of vitamin D but the amount of vitamin D in food is not enough to meet our needs. Food sources of vitamin D include cod liver oil, oily fish (salmon, mackerel, sardines, herring), liver, egg yolk, and milks and cereals with added vitamin D.

★ Tip

Supplements can interact with your prescribed medications. It's important to tell your doctor and pharmacist about all of the dietary supplements you take.

Vitamin D deficiency

Vitamin D deficiency is common in Australia with over 30% of adults having a mild, moderate or even severe deficiency. Low vitamin D levels can:

- Lead to bone and joint pain
- Increase the risk of bone fracture in older people
- Result in a disorder in which bones become soft and weak, known as rickets (when very serious)

Only people at risk of vitamin D deficiency may need their vitamin D levels checked. Your health professional will determine if you require a test based on your general level of sun exposure, medical history and risk factors. Vitamin D levels are likely to change throughout the year with concentrations being highest in late summer and lowest at the end of winter.



Weekly calcium intake

Refer to your fact sheet on calcium requirements, sources of calcium, and serving sizes of calcium-containing foods.

For one week write down any foods or drinks that you consume (type of food/drink and serving size) that contain calcium. See how many days of the week you are getting the recommended number of serves of calcium.

	Breakfast	Snack	Lunch	Snack	Dinner	Snack	Total servings
Example:	250mL regular milk on cereal (1 serve)	2 slices of cheese (1 serve)	60g sardines on toast (1 serve)	No Snack (0 serve)	Chicken stir fry with rice (0 serve)	1 pot of yoghurt (200g) (1 serve)	4 servings
Monday							
Tuesday							
Wednesday							
Thursday							
Friday							
Saturday							
Sunday							

Are you getting the recommended serves of calcium each day?
 Speak to your doctor if you're concerned about your calcium levels.