

## Do you sometimes feel like your digestive system needs a reboot?

It's normal to feel uncomfortable and experience some gut disturbances from time to time. One thing that can help is eating more fibre and drinking more water. Not eating enough fibre can affect the health of your digestive system.

## How does fibre help keep my digestive system healthy?

Fibre is one of the most essential nutrients for gut health. And no, it's not just about going to the toilet, although being regular is a great benefit. Fibre helps you feel fuller and certain types are the perfect food source for the healthy bacteria living in your intestine. Eating enough fibre can promote the right balance of healthy gut bacteria (the microbiome) and support a healthy gut. Young and old, male and female - everyone needs to look after their tiny passengers!

**Fibre feeds the good gut bacteria and promotes a healthy gut**

### How much fibre do I need?¹

**Adults:** 25 -30g per day

Adults with a chronic illness (e.g. diabetes) require 28-38g per day; 28g for females and 38g for males per day.

**Children:** 14-18 grams per day (ages 1-8 years)  
20-28 grams per day (ages 9-18 years)

### How much fibre is in common foods?

1 medium apple	3g
½ cup steamed broccoli (~150g)	3g
⅔ cup high fibre cereal (~40g)	6g
1 slice wholegrain bread	2.5g
½ cup cooked oats with water (porridge)	2.5g
1 cup cooked green lentils (150g)	8g
Handful of raw almonds	2g



The above serves are in reference to the Australian Dietary Guidelines, not in reference to carbohydrate content.

## That sounds like a lot of fibre, how can I do it?

It's actually easy. Fibre comes from plant foods, so having a few more of these will help do the trick.

Getting a variety of fibres from vegetables, fruit, grains, nuts, seeds and legumes (that's beans, chickpeas and lentils) is a great way to get all the benefits.

## Why do I need a variety of fibres? Can't I just focus on one?

All plant foods contain a combination of different fibres and there are three main types.

**Soluble fibre:** helps to control cholesterol and blood glucose levels. You find this type in fruit, vegetables and grains such as oats and barley. It can also be found in psyllium, legumes and seeds.

**Insoluble fibre:** these fibres move all the way down to the colon where they help to make your stool heavier and easier to pass. In other words, they help you go to the toilet. You find this fibre in the bran of grains and in fruit and vegetable skins.

**Fermentable fibre:** these fibres feed the good gut bacteria in the intestine, which helps to keep a healthy digestive system and produce compounds that protect your bowel. You find this type of fibre in grains, legumes, cooked cold potatoes and onions. Some soluble fibre can also be fermented, so it's good to enjoy a variety of fibre.



## How do I achieve a healthy fibre intake?

Try to have these every day and you will be on your way to good gut health. Increase fibre intake gradually to ensure your body can comfortably adapt to an increased fibre eating pattern. For further advice, speak with an Accredited Practising Dietitian (APD). Call the Dietitians Association of Australia: 1800 812 942 or the Diabetes NSW & ACT helpline: 1300 342 238.

- 2 serves of whole fruit, preferably with skin
- 5 serves of vegetables
- 4-6 serves of grains, preferably high fibre or wholegrain
- 1 serve of nuts or legumes

Eat the above, together with lean protein foods (i.e. meat & eggs), some dairy and healthy fats. Don't forget to drink water too. An adequate water intake is very important to help keep things moving through your bowel.



1 serve = 1 medium banana, ½ cup berries, 1 medium apple



1 serve = ½ cup of cooked vegetables, ½-1 cup of salad greens, 1 medium carrot



1 serve = ⅓ cup of breakfast cereal, ½ cup of cooked porridge, ½ cup of low GI rice, 1 slice wholegrain bread



1 serve = ¾-1 cup of cooked legumes, small handful of nuts

## Did you know that there are nearly 2kg of tiny bugs living in your intestine?

Most of these gut bacteria keep us healthy, others can cause trouble. So it's in our best interest to make sure we have plenty more of the good ones and less of the bad.

Some foods we eat contain good bacteria (probiotics) such as yoghurt and fermented foods, but it's not entirely clear how these affect diversity in the gut. The best way to support a healthy gut is to eat a wide variety of fibres from different plant foods, which encourage the good gut bacteria to grow and multiply.

Well fed good gut bacteria produce compounds that can help support immunity, protect against cancers in the bowel, regulate nutrient metabolism and reduce inflammation in the body<sup>2,3,4</sup>. There is also emerging evidence that these compounds can help you maintain a healthy weight<sup>5</sup>.



## Which grain foods contain fibres that feed the good gut bacteria?

- High fibre or wholegrain breakfast cereal and breads
- Oats
- Whole wheat flour
- Whole barley, quinoa, buckwheat and sorghum
- Corn
- Spelt flour

## Other foods with fermentable fibres are...

Legumes: beans and lentils | Apples | Cold or reheated cooked rice | Cooked cold potatoes | Green bananas | Onions

## Healthy Gut Shopping List

- High fibre or wholegrain cereal or rolled oats
- High fibre or wholegrain bread
- Tins of chickpeas, 3-bean mix or lentils
- Sweet potatoes or potatoes
- Fresh apples
- Low-GI rice (e.g. Basmati, Doongara)
- Bananas
- Onions
- Variety of non-starchy vegetables: broccoli, zucchini, carrots, capsicum.

A healthy gut microbiome comes from a diverse eating plan, rich in fibre from a variety of plant foods including whole grains.

1 Australian Government, NHMRC, Nutrient Reference Values  
2 Hamer et al. *Alimentary Pharmacol Therapeutics*. 2008; 27(2):104-119  
3 Den Besten et al. *J Lipid Res*. 2013; 54(9): 2325-2340  
4 Kim et al. *Immune Netw*. 2014; 14(6): 277-288  
5 Rios-Covián et al. *Front Microbiol*. 2016 doi: 10.3389/fmicb.2016.00185

This fact sheet is not meant to replace dietary advice provided by your doctor or dietitian. Please consult with your doctor or dietitian before making changes to your eating plan.