

FACT SHEET FOR PROFESSIONALS

BREAKFAST CEREALS AND DIETARY FIBRE

Breakfast cereals contribute significant amounts of dietary fibre to Australian diets, while being low in kilojoules and nutrient dense. Research suggests that the fibre from cereal foods may be more protective to our health than the fibre from vegetables.

Regular consumption of high-fibre breakfast cereals is associated with:

- improved bowel health,
- reduced risk of type 2 diabetes and cardiovascular disease,
- reduced risk of premature death from cancer, heart disease, respiratory disease, diabetes, and
- improved satiety.

Improved bowel health

The relationship between insoluble fibre and bowel health has been well established:

- eating high-fibre wheat-based breakfast cereals helps to prevent constipation and improves bowel function (Grade A),¹ and
- consuming one to three serves of high-fibre cereal foods per day is associated with reduced risk of colorectal cancer in adults (Grade C).²

Reduced risk of type 2 diabetes

Consuming breakfast cereals rich in whole grains and soluble fibre can improve blood glucose levels and may reduce the risk of developing type 2 diabetes:

- regular consumption of whole grain and high-fibre breakfast cereals is associated with a reduced risk of diabetes (Grade B),¹
- consumption of high-fibre breakfast cereals, especially those high in soluble fibre, may assist in the management of hyperglycaemia in people with diabetes (Grade C),¹ and
- consumption of cereal foods (especially three serves a day of whole grains) is associated with reduced risk of type 2 diabetes (Grade B).²

Reduced risk of CVD and reduced cholesterol

The association between consuming breakfast cereals rich in soluble fibre and cardiovascular disease has been examined by several large scientific reviews. In summary:

- regular consumption oat-, barley- or psyllium-based breakfast cereals (cereals rich in soluble fibre) can help lower total and LDL cholesterol levels (Grade A),¹ and
- consumption of cereal foods (especially whole grains and those with fibre from oats or barley) is associated with a reduced risk of cardiovascular disease in adults (Grade B).²

Reduced risk premature death from diet-related chronic diseases

Recent studies concluded:

- people who consumed the greatest amount of cereal fibre had a 19% reduced risk of death from all causes and a reduced risk of premature death from a range of chronic disease including cancer (15%), heart disease (20%), respiratory disease (21%) and diabetes (34%).³
- the protective effects of whole grains may be due, at least in the main part, to its cereal fibre component,³
- cereal fibre was more protective than the fibre from vegetables,⁴
- people consuming a high fibre diet (27-35g/day) had a 23-37% lower risk of total mortality compared to those with relatively low fibre intakes (15g-17/day),^{4,5} and
- each additional 10g of fibre per day, lowered the risk of death from all causes by 11%.⁵

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Improved satiety

The totality of evidence suggests that regular consumption of high-fibre breakfast cereals is associated with improved satiety. In summary:

- consumption of high-fibre breakfast cereals improves satiety and may reduce self-assessed hunger after a meal by up to 76%,¹ and
- eating breakfast cereal high in insoluble fibre (like those with wheat bran) may result in less kilojoules consumed at breakfast and lunch, possibly due to the high satiety value.⁶

Good source of fibre and nutrient dense

- The 2011-12 Australian Health Survey shows breakfast cereals (ready-to-eat and hot porridge styles) provide 10.6% of fibre intakes per capita for Australians 2 years and over, while contributing very little towards kilojoules (energy 4.6%), total sugars (3.4%) and sodium (around 2%) intakes.⁷
- Adults are recommended to consume between 25-30g of fibre each day⁸. An average 40g serve of ready-to-eat cereal, muesli or oats contains around 4g of fibre, with some higher fibre options containing upwards of 10g a serve,⁹ making breakfast cereals a valuable source of this important nutrient.
- Over 215+ breakfast cereals on Australian supermarket shelves contain either a source, good source or excellent source of fibre according to Food Standards Australia and New Zealand criteria ($\geq 2\text{g/serve}$, $\geq 4\text{g/serve}$ or $\geq 7\text{g/serve}$ respectively).^{9,10}

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References

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- 3 Huang T, Xu M, Lee A, Cho S, Qi Lu. Consumption of whole grains and cereal fiber and total and cause-specific mortality: prospective analysis of 367,442 individuals. *BMC Medicine* 2015; **13**: 59 DOI 10.1186/s12916-015-0294-7.
- 4 Kim Y, Je Y. Dietary Fiber Intake and Total Mortality: A Meta-Analysis of Prospective Cohort Studies. *American Journal of Epidemiology* 2014; **180**(6): 565-73.
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- 7 Australian Bureau of Statistics. Australian Health Survey: Nutrition First Results - Foods and Nutrients, 2011-12. Canberra: ABS; 2014. (Also available from: <http://www.abs.gov.au/ausstats/abs@.nsf/Lookup/4364.0.55.007main+features12011-12>, accessed 9 June 2015).
- 8 National Health and Medical Research Council and New Zealand Ministry of Health. Nutrient Reference Values. Canberra: NHMRC; 2006. (Also available from: <https://www.nrv.gov.au/nutrients/dietary-fibre>, accessed 9 June 2015).
- 9 Grains & Legumes Nutrition Council (GLNC). 2014 Grains and Legumes Product Audit. Unpublished: 2014.
- 10 Australia New Zealand Food Standards Code - Standard 1.2.7 Nutrition, Health and Related Claims; 2014. (Also available from: <http://www.comlaw.gov.au/Details/F2014C01191>, accessed 9 June 2015). NB: Food businesses are required to comply with Standard 1.2.7 from January 2016).

Interpreting evidence grades

According to NHMRC guidance, Grade A evidence is to be trusted to guide clinical practice, Grade B is to be trusted to guide practice in most situations, Grade C provides some support but care should be taken in its application, and Grade D is suggestive, where the body of evidence is weak and therefore the statement should be applied with caution.

About the Australian Breakfast Cereal Manufacturers Forum (ABCMF)

The ABCMF provides evidence-based, practical information so Australians can have a better understanding of the true value of breakfast cereals and breakfast as part of a healthy lifestyle. The ABCMF is a forum of the Australian Food and Grocery Council.

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Connect with ABCMF for the latest information on breakfast cereals:

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