

Fracture risk more important than bone density

29 January 2016, by Suzi Phillips

Low bone density is very uncommon in patients with coeliac disease, according to new research from the University of Auckland.

Coeliac [disease](#) is an intestinal disorder that can decrease absorption of nutrients and vitamins.

In a study published in today's *New Zealand Medical Journal*, bone researchers, Associate Professors Mark Bolland and Andrew Grey, noted that average [bone density](#) in a group of adults suffering from [coeliac disease](#) was normal.

"This suggests bone density measurement is not routinely indicated in coeliac disease, but can be considered on a case by case basis for individuals with strong risk factors for fracture," says Dr Grey.

"Most of the people with coeliac disease referred for the test (137 adults with an average age of 47 years) were in an age group where fragility [fractures](#) are very uncommon."

"When coeliac disease is treated, it usually results in improved nutrition and the [fracture risk](#) declines," he says. "The clinical recommendation from this work is that for well-nourished people with this disease, there is no compelling reason to order a [bone mineral density](#) measurement."

He says this work aligns with another study conducted by their research team that assessed the recommendations of clinical guidelines for managing bone health and was published recently in *Clinical Endocrinology*.

"In that work, we found that guidelines from non-osteoporosis specialist medical organisations strongly encouraged the measurement of bone density, but didn't discuss the risk of fracture, when fracture is the important outcome," says Dr Grey.

"We think a lot of referrals for bone density testing are from clinicians responding to these guidelines,

which should be focusing more strongly on fracture risk."

"An important point when considering whether to request a bone density scan in a patient with coeliac disease is the natural history of bone density changes following diagnosis," says Dr Grey. "Longitudinal studies of individuals with treated coeliac disease show that body weight and bone density increase."

"If body weight and bone density are likely to increase following diagnosis and treatment with a gluten-free diet, and [low bone density](#) is both uncommon and unlikely to be clinically significant, the justification for routinely measuring bone density at diagnosis is weak," he says.

A small proportion of individuals with coeliac disease have low bone density - 12 percent of this cohort.

"For younger individuals with no clinical risk factors for fracture, whose bone density is likely to increase over time, the short-medium term fracture risk is low and knowledge of the bone density, even if it is low, is unlikely to lead to a change in management," say the authors.

For such people, measuring bone density is unnecessary. For older people or those with strong clinical [risk factors](#) for fracture, the short-term risk of fracture is higher and measuring bone density could be considered on a case-by-case basis.

The findings of the study might help to reduce unnecessary testing. "For example, if bone density measurements in our cohort had been restricted to those with BMI less than 20 kg/m² or those aged over 50 years with BMI less than 25 kg/m², 69 percent of those with low bone would have been identified, and 69 percent of the total number of scans would have been avoided," say the authors.

Provided by University of Auckland

APA citation: Fracture risk more important than bone density (2016, January 29) retrieved 12 October 2022 from <https://medicalxpress.com/news/2016-01-fracture-important-bone-density.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.