# **BE BONE HEALTHY**

# AN EATING GUIDE FOR BUILDING AND MAINTAINING HEALTHY BONES.

Healthy bones matter! Our bones support us, protect us and allow us to move freely. They need the right nutrients to stay strong and healthy. A nutritious diet rich in calcium, fish and other lean proteins, fruits and vegetables benefits your bone and muscle health at all ages and reduces your risk of osteoporosis and fragility fractures.<sup>1</sup> And the great news is that many of these delicious foods contain more than one of the bone healthy nutrients your body needs.

Follow this guide to make sure you get the right balance of bone-healthy nutrients in your diet.

# THREE ESSENTIAL INGREDIENTS FOR STRONG & HEALTHY BONES...



# **CALCIUM**

#### THE MAJOR BUILDING BLOCK OF BONE 1-3

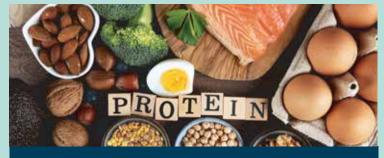
The average adult body contain 1kg of calcium, of which 99% resides in the skeleton. Your bones are the reservoir for maintaining calcium levels in the blood, which is needed for healthy nerve and muscle function. If your blood does not have enough calcium, it responds by taking calcium from your bones.

#### For teens

Extra calcium is needed during this period of rapid bone growth, during which half of our bone mass is accumulated.

### For postmenopausal women and older adults

Your body's ability to absorb calcium declines as you age, so older adults need more calcium in their diets to maintain healthy bones and muscles.



# **PROTEIN**

#### FOR STRONG BONES AND MUSCLES<sup>1-3</sup>

Protein provides your body with a source of essential amino acids necessary for building and preserving bone and muscle.

#### For children and teens

Protein-rich foods help bones to develop and grow optimally.

#### For older adults

Need more dietary protein than the young to maintain physical function. A lack of protein can lead to lower bone mineral density and can reduce muscle strength, and increase the risk of falls.

After a fracture, increasing protein in the diet has been shown to improve bone density, reduce rehabilitation time and reduce the risk of other complications.

# **VITAMIN D**

#### STRONG BONES WITH HELP FROM THE SUN1

Your body needs vitamin D to absorb calcium and it also helps you to build up the minerals that makes your bones strong. Vitamin D is made when your skin is exposed to the UV-B rays in sunlight. Spending a short amount of time in the sun each day (as little as 10–20 minutes) can provide you with some of your vitamin D needs.

And a limited number of foods such as egg yolks, liver, oily fish and fortified milk can help you to get extra vitamin D in your diet. Some adults will need a vitamin D supplement to achieve the recommended daily allowance (600 – 800 IU per day depending on your age).



## MICRONUTRIENTS FOR HEALTHY BONE<sup>1,3</sup>

A daily diet filled with fruits and vegetables also helps us get enough of the essential vitamins and minerals that play a role in bone and overall health. These nutrients are needed in small amounts to support healthy bone growth and development.

# **VITAMIN K**

Needed for the correct mineralisation of bone.

#### WHERE TO FIND IT:

Leafy green vegetables, some fermented cheeses & dried fruit

# **MAGNESIUM**

Helps to form bone mineral.

#### WHERE TO FIND IT:

Green vegetables, legumes, nuts, seeds, unrefined grains & fish.

# ZINC

An essential trace element needed for bone tissue renewal and mineralisation.

#### WHERE TO FIND IT:

Lean red meat, poultry, whole grain cereals, pulses & legumes.

# **CAROTENOIDS**

A precursor to vitamin A that is linked to improved bone health.

#### WHERE TO FIND IT:

Green leafy vegetables, carrots, pumpkins, peppers, mangoes, papaya & apricots

# 20 "BE BONE HEALTHY" INGREDIENTS<sup>4</sup>

These foods are great sources of calcium and other nutrients to support your bone health.

#### **DAIRY FOODS**



FRUITS & VEGETABLES

NUTS, LEGUMES & GRAINS









































# RECOMMENDED DAILY INTAKE OF KEY NUTRIENTS FOR ADULTS<sup>1,3</sup>

Ensure that your diet has enough calcium, protein and vitamin D. These nutrients help to support bones and muscles and thereby help to lower the risk of falls and fractures. And talk to your doctor about a bone healthy diet today!

References 1. International Osteoporosis Foundation. Serve up bone strength throughout your life. 2015. 2. International Osteoporosis Foundation. Serve up bone strength. Nutrition and bone health throughout life. Fact sheet. 2015. 3. International Osteoporosis Foundation. Prevention. 4. Food Standards Australia & New Zealand. Australian Food Comparison Database. 2019.

AGE	GENDER	CALCIUM	PROTEIN*	VITAMIN D
19–50 years	Female	1000 mg	46 g	600 IU
	Male	1000 mg	56 g	600 IU
51–70 years	Female	1200 mg	46 g	600 IU
	Male	1000 mg	56 g	600 IU
> 70 years	Female	1200 mg	46 g	800 IU
	Male	1200 mg	56 g	800 IU

<sup>\*</sup>Recommended daily intake of protein for healthy adults is 0.8 g per kilogram of body weight.

