

THE OSTEOCARE PLUS BONE CHALLENGE

A twelve week challenge to help keep your bones strong and healthy



Vitabiotics
Osteocare
plus


VITABIOTICS

WELCOME TO **THE OSTEOCARE PLUS** BONE CHALLENGE



Nutritionist
Vicki Edgson



Chef
Amanda Cross



Personal Trainer
Ricardo Macedo

Vitabiotics Osteocare® Plus has joined forces with leading Nutritionist, Vicki Edgson, Personal Trainer to the stars, Ricardo Macedo and celebrity Chef, Amanda Cross to create a 12 week challenge aimed at achieving optimum bone health. We invite you take part in the challenge and have provided you with bone building meal plans and recipes to follow together with a high impact exercise regime to help you achieve healthy and strong bones.

Osteocare Plus is the newest addition to the Osteocare range and contains the UK's number one bone health formula with an additional soy isoflavones/omega-3 capsule to provide advanced support to help keep bones strong and healthy.

The well-balanced formula provides a rich source of calcium with co-factors to help maintain strong bones and teeth, as well as the health of the heart, muscles and nerves. The formula includes the full-recommended daily allowances of calcium and magnesium, which play a vital role in bone development, along with vitamin D and zinc.

The soy isoflavones and omega-3 capsules in Osteocare Plus provide additional nutrients which scientists have recognised may play an important role in maintaining bone health. Soy is a rich source of isoflavones which have been linked to the maintenance of bone health. Omega-3 fatty acids from fish oils help maintain healthy joints and bones.

BACKGROUND TO BONE HEALTH

Bone is living tissue from which substances are constantly being removed and replaced. Calcium is the most abundant mineral found in bone and it is also comprised of protein, phosphates, magnesium and zinc. It is estimated that the average adult skeleton contains approximately 1kg of calcium¹.

Calcium is essential for maintaining total body health. Your body requires it every day not just to keep your bones and teeth strong but to also ensure proper functioning of muscles and nerves. It even helps your blood clot.

Calcium has a number of important functions. It:

- **helps build strong bones and teeth**
- **regulates muscle contraction, including the heartbeat**
- **makes sure blood clots normally**

Bone formation and replacement of old bone tissue takes place throughout life, at different rates and at different times. During childhood and adolescence, much more bone is continually formed with minimal bone loss, so the skeleton grows in both size and density. Up to 90 percent of peak bone mass, where bone has reached maximum strength and density, is acquired by age 18 in girls and age 20 in boys, which makes youth the best time to invest in bone health. However, according to the National Osteoporosis Society, only 10 percent of girls and 25 percent² of boys get the calcium they need in their tween years, ages 9-13, to build peak bone mass.

Bone mass, the amount of bone tissue in the skeleton, is influenced by a variety of genetic and environmental factors. It has been suggested that genetic factors may account for up to 75 percent of bone mass, while environmental factors (like your diet and exercise habits) account for the remaining 25 percent. Although bone formation and loss is influenced by a variety of factors including diet and physical activity it is also accelerated at particular life stages, for example the menopause.

Bone mass can continue growing and developing until around the age of 30. At this point, bone mass has reached its peak. In women, there is minimal change in total bone mass between the age of 30 and the age the menopause begins. In the first few years after the menopause, women start to experience rapid bone loss as the production of oestrogen, which helps protect bones, eventually ceases. Men tend to have greater bone mass than women.

1. British Nutrition Foundation

2. National Institute of Arthritis and Musculoskeletal & Skin Diseases (NIAMS)

DIET & BONE HEALTH

Diet plays an important part in forming healthy bones. Calcium is taken from the foods you eat and deposited into your bones and teeth so adequate calcium intake is vital at all stages of life. The main source of calcium in the UK diet is found in dairy products with milk and cheese providing 48 percent of the calcium in the average UK household.

Vitamin D is also important for healthy bones because it is needed for the absorption of calcium from food. You get most of your vitamin D from the sun as the vitamin forms under the skin in reaction to sunlight. However, vitamin D can be found in a small number of foods including oily fish, eggs as well as some fortified foods such as margarine, breakfast cereals and powdered milk. D3 is the preferred form of vitamin D because it is the specific form made in the human body. (Osteocare Plus contains the preferred D3 form of vitamin D).

The recommended daily amount of calcium for adults is 700mg and your diet should be able to provide you with this amount but due to our hectic lifestyles this isn't always possible. Although calcium intake appears to be adequate in children and adult men, inadequate intakes are reported in teenagers and young women.³

Ideally you should get all the calcium you need from your daily diet. To put it into perspective 700mg of calcium a day equates to:

- 6 slices of white bread or,
- 7 servings of cooked broccoli or,
- 16 servings of cooked cauliflower or,
- 8 medium bags of peanuts or,
- 10 tablespoons of red kidney beans or,
- 50 almonds or,
- 3 glasses of skimmed milk

To ensure that you get the recommended daily allowance of calcium, you may want to take a supplement such as **Vitabiotics Osteocare Plus** which provides a safe and well balanced level of calcium and co-factors to help maintain strong bones.



EXERCISE

Similar to muscles and other parts of the body, bones suffer if they are not used. They require regular weight bearing exercise which places force through the bone, stimulating growth and therefore strength. Weight bearing exercise actually stimulates the cells that produce new bone tissue, maximising the density of your bones and conserving remaining bone tissue. The type of exercise carried out is important, as only weight bearing exercise and weight training will have direct benefits on bone as it forces you to work against gravity.

Weight bearing activity like walking, jogging, skipping and aerobics are all effective forms of exercise which can help increase bone mass as they place force through the bone and stimulate growth and strength. Exercises that are not weight-bearing include swimming and cycling and while these activities help build and maintain strong muscles and have excellent cardiovascular benefits, they are not the best way to exercise your bones.

Thirty minutes of weight-bearing exercise daily benefits not only your bones but improves heart health, muscle strength, co-ordination and balance. Those thirty minutes do not necessarily need to be carried out all at once as it can be just as effective in short bursts of 10 minutes at a time.

Ensuring an adequate intake of calcium is vital for women and men of all ages, as evidence suggests that the earlier you start looking after your bones the better. Healthy early life practices, including exercise and the adequate consumption of calcium and trace elements, contribute to greater bone strength throughout your later life.

WHICH FOODS PROVIDE CALCIUM?

Food (normal portion size)	Calcium (mg)
Low fat fruit yoghurt	225
Skimmed milk	235
Cheddar cheese	202
Salmon, tinned	52
Figs (dried)	76
Large orange	58
Baked beans	59
Red kidney beans, cooked	80
Soya milk	25
Tofu	1480
Spinach (boiled)	160
Curley kale (boiled)	150
Apricots (dried)	92
Almonds	240
Sesame seeds	670
Watercress	170
Bread – white	33
Bread - wholemeal	16
Brazil nuts	95



THE VITABIOTICS OSTEOCARE RANGE

Osteocare, Britain's best selling calcium supplement, has been formulated by leading doctors, nutritionists and pharmacists to provide the full-recommended daily levels of calcium, magnesium and vitamin D, plus zinc to protect bones and help maintain healthy muscles and nerves.

The well-balanced formula provides a rich source of calcium with co-factors to help maintain strong bones and teeth, as well as the health of the heart, muscles, and nerves. The formula includes the full-recommended daily allowances of calcium (800mg) and magnesium (300mg), which play a vital role in bone development, along with vitamin D3 and zinc. Vitamin D is necessary for the absorption and utilisation of calcium, and zinc helps in the constant regeneration of bone.

The Osteocare formulation is based on the very latest international findings on the role of nutrients in bone health, as well as multiple large-scale scientific studies in the past 20 years. Osteocare is also the only calcium supplement in the UK with the full RDA of calcium and magnesium to be officially approved by the Vegetarian Society.

Osteocare Plus is the newest addition to the Osteocare range and contains the UK's number one bone health formula with an additional soy isoflavones/omega-3 capsule to provide advanced support to help keep bones strong and healthy.

The soy isoflavones and omega-3 capsules in Osteocare Plus provide additional nutrients which scientists have recognised may play an important role in maintaining bone health. Soy is a rich source of isoflavones which have been linked to the maintenance of bone health. Omega-3 fatty acids from fish oils help maintain healthy joints and bones.

Also available is Osteocare chewable which contains the same trusted formula as the original Osteocare but is flavoured with orange and peppermint to make a great tasting chewable tablet. For those who may have difficulty swallowing large tablets or have impaired nutrient absorption there is also Osteocare Liquid and Osteocare Fizz.



Osteocare® Original Tablets

Osteocare® Chewable Tablets

Osteocare® Plus Dual Pack

Osteocare® Liquid

Osteocare® Fizz