

# Cazein Forte

Milk Calcium, Phosphorus and Vitamin D tablets

Ca



Milk Calcium for **Healthy & Strong Bones**

Body Needs  
**1000 mg**  
Calcium

**20 mcg**  
Vitamin D3  
Daily

 **Chewable  
Tablets**



## SUPPLEMENTS VS DIETARY CALCIUM

	Milk Calcium	Calcium supplement
<b>Drug Interactions</b>	The Calcium is protected by the Casein phosphopeptides (CPP) and hence interactions are far fewer.	Calcium supplements can interact with several medications: the absorption of calcium from calcium carbonate is reduced by proton pump inhibitors, while calcium supplements may interact with antibiotics, thiazide diuretics, digoxin and phenytoin.
<b>Absorption</b>	Active and Passive transport. Casein phosphopeptides (CPP) bind calcium and therefore protect it against precipitation with anions such as phosphates in the small intestine. The net result is an increase of passive calcium absorption in the ileum.* <sup>5</sup>	Transcellular pathway (active transport) account for majority of absorption.
<b>Vit D deficiency</b>	Can be also absorbed by the influence of lactose in the distal small intestine via the paracellular route. Thus milk can provide calcium with “ensured absorbability” which is generally insensitive to external factors.* <sup>6</sup>	Impacts Calcium absorption.
<b>Absorption inhibitors</b>	No Effect of inhibitors, as calcium is protected in CPP.	Supplemental calcium absorption is inhibited by phytates, oxalates, uronic acids or polyphenols in diet.
<b>Calcium utilization</b>	The availability of calcium for bone mineralization appears to be greater for dairy foods and the effects are longer lasting.* <sup>8</sup>	Absorption of calcium is non inferior to dairy calcium but utilization in bone is less.
<b>Phosphorous content</b>	Increased inorganic phosphate intake leads to decreased urinary calcium and increased calcium retention. calcium and inorganic phosphate in a ratio close to that found in dairy products leads to positive effects on bone health.* <sup>9</sup>	Conventional supplements have no phosphorous.
<b>PPI usage/ achlorhydria</b>	Milk calcium is bound to peptides and proteins making it efficacious.* <sup>10</sup>	Impaired acid levels impact Calcium absorption.
<b>Meal Effect</b>	Provide an almost complete diet whose consumption provides a “meal effect”. This fosters the absorption of calcium and provides a simultaneous intake of phosphorus that is essential for bone deposition.	Calcium supplements do not contain the additional nutrients—including protein, phosphorous and magnesium.

Reference:

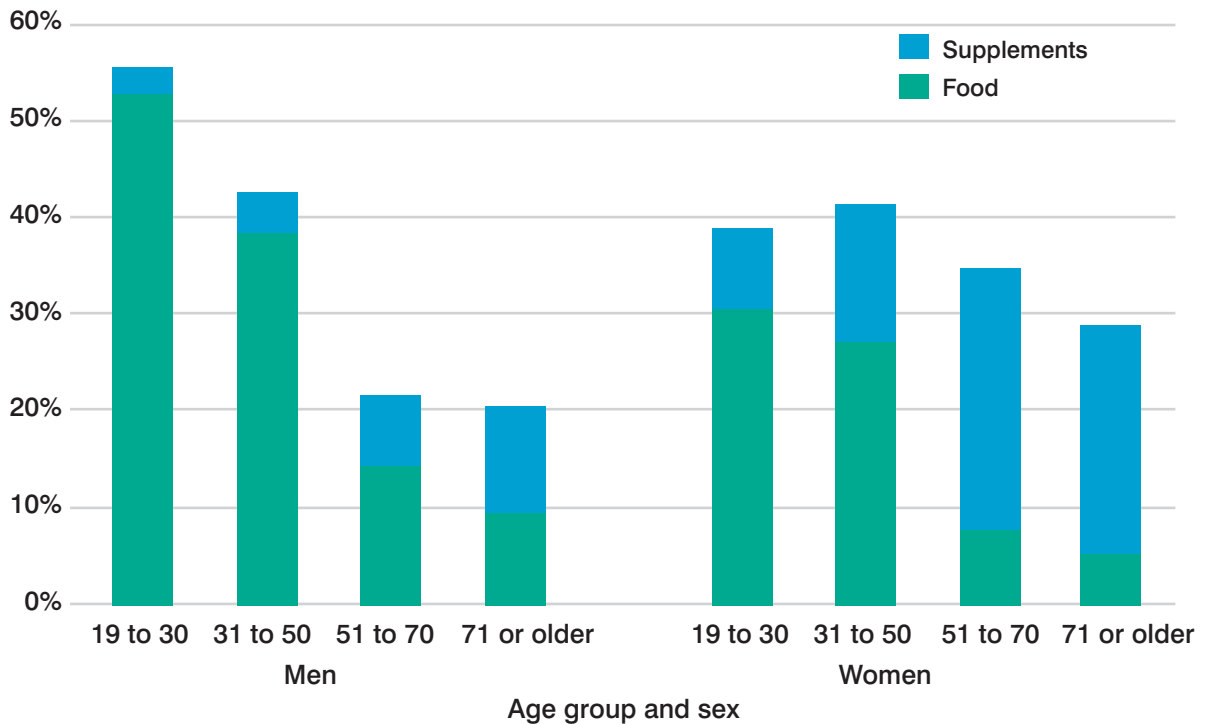
\*5. J Am Coll Nutr. 2000;19(2 Suppl):119S-136S. \*6. J Am Coll Nutr. 2000 Apr;19(2 Suppl)119S-136S. \*7. J Am Coll Nutr. 2000 Apr;19(2 Suppl)119S-136S. \*8. J Am Coll Nutr. 2009 Feb; 28 Suppl 1():82S-90S. \*9. Am Coll Nutr. 2013; 32(4):251-63. \*10. J Am Coll Nutr. 2000 Apr;19(2 Suppl)119S-136S.

Worldwide, 1 in 3 women over age 50 will experience osteoporotic fractures, as will 1 in 5 men aged over 50.\*<sup>1</sup>

By 2050, the worldwide incidence of hip fracture in men is projected to increase by 310% and 240% in women, compared to rates in 1990.\*<sup>2</sup>

Mortality rates post-hip fracture vary between 25-30% in western populations, they are 2-3 fold higher in populations from the Middle East and Africa region.\*<sup>3</sup>

## CALCIUM INTAKE FROM FOOD AND SUPPLEMENT\*<sup>4</sup>



**Although calcium intake is indeed a risk factor; Over the age of 50 in Women, majority of Calcium intake is through supplementation. BUT WHY IS OSTEOPOROSIS INCREASING IN THIS AGE GROUP?. Is Supplements the right choice??**

 **Women over 50 will experience osteoporotic fractures. As will**  **Men.**

# Cazein Forte

Milk Calcium, Phosphorus and Vitamin D tablets



## CHANGING MINDSET

### Consensus statement from the Belgian Bone Club :

For the non-pharmacological management of osteoporosis, single-nutrient supplements will frequently be inadequate and preference should go to the use of complete supplements or complete foods such as dairy products.\*<sup>11</sup>

### European guidance for the diagnosis and management of osteoporosis in postmenopausal women:

Calcium supplementation should only be targeted to those who do not get sufficient calcium from their diet and who are at high risk for osteoporosis and/or fracture.\*<sup>12</sup>

## TRIALS

Dairy calcium is non-inferior to calcium from mineral salts, the availability for bone mineralisation appears to be greater for dairy foods and the effects are longer lasting.\*<sup>13</sup>

Postmenopausal women, those randomised to dairy calcium had greater improvements in arm, pelvis, total spine and total-body bone mineral density (BMD) than those receiving calcium supplements in one trial.\*<sup>14</sup>

Greater increases in insulin-like growth factor-I (IGF-I), which favours bone formation, have also been reported for dairy compared with calcium supplements.\*<sup>15</sup>

### Each Chewable tablet provides:

Milk Calcium 1200 mg  
(Equivalent to Elemental calcium 300mg)

Elemental Phosphorous 150 mg

Cholecalciferol (Vit D3) 400 IU

# Cazein Forte

Milk Calcium, Phosphorus and Vitamin D tablets