

## SCIENTIFIC INFORMATION STEROGYL

### CONTROL OF PLASMATIC LEVELS OF VITAMIN D<sub>3</sub>

Deficiency of Vitamin D is not only related to the increase of the incidence of osteoporosis and fractures, but also of diabetes, cancer, cardiovascular alterations and other diseases. Nowadays, as a result, besides the supplementation, it is recommended an annual measurement of the plasmatic levels of vitamin D in the pursue of getting and maintaining values that are higher than 30 ng/ml.

## The vitamin D epidemic and its health consequences

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### Abstract

Vitamin D deficiency is now recognized as an epidemic in the United States. The major source of vitamin D for both children and adults is from sensible sun exposure. In the absence of sun exposure 1000 IU of cholecalciferol is required daily for both children and adults

Vitamin D deficiency causes poor mineralization of the collagen matrix in young children's bones leading to growth retardation and bone deformities known as rickets. In adults, vitamin D deficiency induces secondary hyperparathyroidism, which causes a loss of matrix and minerals, thus increasing the risk of osteoporosis and fractures. In addition, the poor mineralization of newly laid down bone matrix in adult bone results in the painful bone disease of osteomalacia.

Vitamin D deficiency causes muscle weakness, increasing the risk of falling and fractures. Vitamin D deficiency also has other serious consequences on overall health and well-being. There is mounting scientific evidence that implicates vitamin D deficiency with an increased risk of type I diabetes, multiple sclerosis, rheumatoid arthritis, hypertension, cardiovascular heart disease, and many common deadly cancers.

Vigilance of one's vitamin D status by the yearly measurement of 25-hydroxyvitamin D should be part of an annual physical examination.

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