

Low-dose menaquinone-7 supplementation improved extra-hepatic vitamin K status, but had no effect on thrombin generation in healthy subjects.

Theuwissen E, Cranenburg EC, Knapen MH, Magdeleyns EJ, Teunissen KJ, Schurgers LJ, Smit E, Vermeer C.

Br J Nutr. 2012 Jan 31:1-6. [Epub ahead of print]

Web Link: <http://www.ncbi.nlm.nih.gov/pubmed/22289649>

Background

Recently a publication in the [American Journal of Kidney Disease](#) showed beneficial effects of natural vitamin K2 (MenaQ7[®]) supplementation in dialysis patients. That article showed for the first time evidence for a functional vitamin K deficiency in hemodialysis patients, which can be treated effectively by vitamin K2 supplementation. Yesterday a new publication on the beneficial effects of MenaQ7 on healthy volunteers was [e-published ahead of print](#). The double-blind, randomized and controlled design study investigated effects of daily MK-7 doses of 10, 20, 45, 90, 180 and 360 micrograms on activation (carboxylation) of proteins involved in regulating mineralization; Osteocalcin (Oc, in bone) and matrix gla protein (MGP, in cartilage and arterial vessel walls).

The authors conclude that daily intake of MK-7 at doses in the order of the RDA (Commission Directive 2008/100/EC) results in measurable changes in circulating undercarboxylated (uc) Oc and uc MGP. MK-7 is safe with respect to the haemostatic system, i.e. in subjects not on oral anticoagulants, it does not increase the thrombosis risk even at doses above the RDA (Commission Directive 2008/100/EC).

About MenaQ7[®] MenaQ7[®] provides natural vitamin K2 as a fermentation extract manufactured by using *Bacillus subtilis natto*. This process generates a highly pure and bio-available form of vitamin K2, menaquinone-7 (MK-7). MenaQ7[®] is the best documented, commercially available natural vitamin K2 with guaranteed activity and stability. NattoPharma holds several granted and pending patents that protect the use of K vitamins.

For more information on the health benefits of MenaQ7[®], please visit www.menaq7.com.

About NattoPharma NattoPharma ASA, Norway is the exclusive international supplier of MenaQ7[®], the natural vitamin K2. NattoPharma has since 2007 entered into a multi-year research and development program to substantiate the health benefits of natural vitamin K2. The results underline the relevance and importance for new and innovative applications in the functional food and health food supplement markets.

Please visit www.nattoPharma.com

For more information, please contact:

Dan Edwall

R&D Manager

Phone: +46 70 798 80 89