

A Single Oral Dose of Vitamin D

Have you heard that a single oral dose of vitamin D boosts the immunity against tuberculosis by inhibiting the growth of mycobacteria, which cause the disease? Vitamin D was used to treat tuberculosis in sanatoriums before antibiotics came into use. But there have been no previous studies to evaluate the effect of vitamin D supplementation on the body's immunity to mycobacteria.

Researchers from the Queen Mary's School of Medicine and Dentistry, London conducted a clinical trial involving 192 healthy adults who had been exposed to tuberculosis. The patients were randomly divided into two groups to receive a single oral dose of 2.5mg of vitamin D and a placebo. Of the 192 patients, 43 were lost during follow-up and 18 were excluded, so that 131 patients were included in the analysis of primary outcome. Of these, 64 received placebo and 67 received vitamin D. After six weeks, the patients were tested for evidence of tuberculosis.

The findings showed that vitamin D supplement significantly enhanced the immunity of the patients to Mycobacterium tuberculosis compared with those who received the placebo. Thus, vitamin D has the potential to ward off tuberculosis. However, further research is required to determine whether vitamin D supplementation prevents reactivation of latent tuberculosis infection.