primary studies - published RCT

Impact of vitamin D supplementation on markers of inflammation in adults with cystic fibrosis hospitalized for a pulmonary exacerbation.

Code: PM22805498 **Year:** 2012 **Date:** 2012 **Author:** Grossmann RE

Study design (if review, criteria of inclusion for studies)

RCT

Participants

30 adults with CF hospitalized with a pulmonary exacerbation

Interventions

250 000 IU of cholecalciferol or placebo

Outcome measures

changes in plasma concentrations of inflammatory markers and the antimicrobial peptide LL-37 at baseline and 12 weeks post intervention.

Main results

In the vitamin D group, there was a 50.4% reduction in tumor necrosis factor-alpha (TNF-alpha) at 12 weeks (P

Authors' conclusions

This study supports the concept that vitamin D may help regulate inflammation in CF, and that further research is needed to elucidate the potential mechanisms involved and the impact on clinical outcomes.

http://dx.doi.org/10.1038/ejcn.2012.82

See also

Eur J Clin Nutr. 2012 Sep;66(9):1072-4. doi: 10.1038/ejcn.2012.82. Epub 2012 Jul 18.

Keywords

Bacterial Infections; Exacerbation; Infection; Inpatient; non pharmacological intervention - diet; Respiratory Tract Diseases; Respiratory Tract Infections; Virus; Vitamin D; Vitamins; High-Dose; Adult; pharmacological_intervention;