

primary studies - published RCT

A pilot clinical trial of oral sodium 4-phenylbutyrate (Buphenyl) in deltaF508-homozygous cystic fibrosis patients: partial restoration of nasal epithelial CFTR function.

Code: PM9476862

Year: 1998 **Date:** 2002

Author: Rubenstein RC

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

double-blind, randomised, crossover design

Participants

Sixteen CF patients (10 boys, 6 girls; age, 5 to 18 years, median 9.5 years) completed the trial.

Interventions

Patients received montelukast (6 to < or = 14 years, 5 mg; > 14 years, 10 mg) or placebo as a once-daily tablet for 21 days and then, after a washout period of at least 4 weeks, crossed over to receive the alternative treatment.

Outcome measures

Blood and native nasal fluid were taken on days 1 and 21 of each treatment block, and WBC count, ECP, and IL-8 were analyzed using a chemiluminescent immunometric assay.

Main results

There was a significant (P

Authors' conclusions

Montelukast reduces eosinophilic inflammation in CF patients. Multicenter trials providing more patients to create more data to prove the hypothesis that montelukast is an effective tool to cut down disease severity in CF patients are needed.

<http://ajrccm.atsjournals.org/content/157/2/484.full.pdf>

See also

Am J Respir Crit Care Med. 1998 Feb;157(2):484-90.

Keywords

Adolescent; Anti-Bacterial Agents; Anti-Inflammatory Agents; Child; Leukotriene Antagonists; non pharmacological intervention - diet; pharmacological_intervention; Supplementation; Tablets; Montelukast; Anti-Inflammatory Agents - excl Steroids;