primary studies - published RCT

Oral Reduced L-Glutathione Improves Growth in Pediatric Cystic Fibrosis Patients: A Randomized Clinical Trial.

Code: PM25633497 **Year:** 2015 **Date:** 2015 **Author:** Visca A

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

Placebo-controlled, randomized, double-blinded clinical trial

Participants

44 pediatric cystic fibrosis patients ages 18 months to 10 years.

Interventions

Treatment with oral glutathione or placebo (Calcium Citrate), each 65 mg/kg/day divided into 3 doses per day at mealtimes, and administered daily for 6 months.

Outcome measures

Primary outcomes were change in weight percentile, BMI percentile, height percentile and fecal calprotectin. Secondary outcomes included liver function tests and measures of systemic inflammation. Each participant was followed for 6 months, with data obtained at baseline, 3 months and 6 months. Blood samples were obtained on the baseline and 6 month visits.

Main results

The GSH treatment group gained an average of +0.67 SD in weight-for-age-and sex z score (wfaszs), (+19.1 weight percentile points) over the course of six months, with no adverse side effects (versus placebo with an increase +0.1 SD in wfaszs (+2.1 weight percentile points), p

Authors' conclusions

Oral reduced L- glutathione (GSH) significantly improves measures of growth status and gut inflammation in CF.This is an open-access article distributed under the terms of the Creative Commons Attribution-Non Commercial-No Derivatives 4.0 License, where it is permissible to download and share the work, provided it is properly cited. The work cannot be changed in any way or used commercially. http://creativecommons.org/licenses/by-nc-nd/4.0.

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See also

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Keywords

Oral; Glutathione; thiols; Antioxidants; pharmacological_intervention;