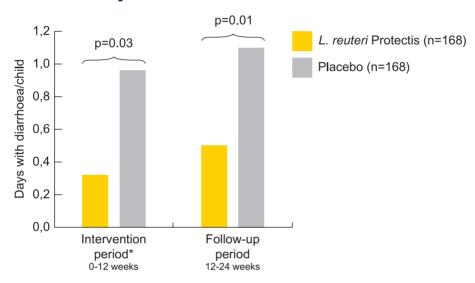
Lactobacillus reuteri Protectis proven to significantly reduce diarrhoea in healthy day care children

This randomized, double-blind, placebo-controlled trial investigated the effects of daily supplementation of L. reuteri Protectis (DSM 17938) on diarrhoea and other health outcomes in healthy day care children. 336 children born at term and aged 6-36 months were enrolled. 168 children received L. reuteri Protectis (10^8 CFU/day) and 168 were given placebo, for three months. After the intervention period the children were followed up for additional three months without supplementation.

Primary outcome was the number of days with diarrhoea per child. This was defined as days when 3 or more loose or watery stools were passed within a 24-hour period with or without vomiting. Secondary outcomes were days with respiratory tract infection, days of absence from day care, days of antibiotic use and days of medical office or emergency visits. In addition to this total direct and indirect costs for the community and for parents were evaluated.

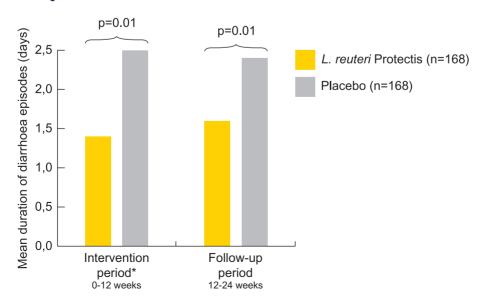
The number of days with diarrhoea was reduced by 67% with *L. reuteri* Protectis supplementation during the intervention period compared to placebo (p=0.03). The effect was significant also during the follow-up period with a reduction of 55% in the *L. reuteri* Protectis group (p=0.01).

67% fewer days with diarrhoea with L. reuteri Protectis*



Significant reduction in the number of episodes and duration of diarrhoea were also observed in the *L. reuteri* Protectis group during the intervention and follow-up periods.

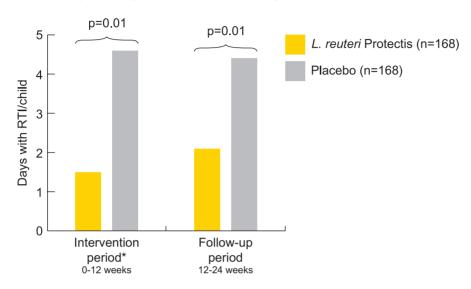
1 day shorter duration of diarrhoea with *L. reuteri* Protectis*





The number of days with respiratory tract infection was reduced by 67% (p=0.01) in the children receiving *L. reuteri* Protectis versus placebo during the intervention period. The number of days with fever, days of absence from day care and days of antibiotic use were also significantly reduced in the *L. reuteri* Protectis group during both intervention and follow-up periods.

L. reuteri Protectis reduced number of days with respiratory tract infections by 67%*



Additionally, the preventive use of *L. reuteri* Protectis was associated with a reduction of 36 USD for each case of diarrhoea and 37 USD for each case of respiratory tract infection.

Conclusions

Healthy children attending day care centres have a significantly reduced risk of suffering from diarrhoea or respiratory tract infections when given *L. reuteri* Protectis daily. Moreover, this study demonstrates an economic benefit to both parents and community by using *L. reuteri* Protectis to prevent diarrhoea and respiratory tract infection in children.

REFERENCE

Gutiérrez-Castrellón P et al. Diarrhea in Preschool Children and Lactobacillus reuteri: A randomized Controlled Trial. Pediatrics, published on-line 17 March 2014, doi: 10.1542/peds.2013-0652

