Diagnosis of cystic fibrosis fat malabsorption: fat absorption test.

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The double labeled triglyceride and free fatty acid fat absorption test is as effective as the fecal fat balance as a quantitative diagnostic test for intestinal fat absorption in CF patients.

Ethische beoordeling	Positief advies
Status	Werving gestart
Type aandoening	-
Onderzoekstype	Interventie onderzoek

Samenvatting

ID

NL-OMON21173

Bron
NTR

Verkorte titel
DLLT

Aandoening

1. Cystic fibrosis;

2. fat malabsorption (NLD: vetmalabsorptie);

3. fecal fat balans (NLD: vetbalans);

4. pancreatic insuffiency (NLD: pancreasinsufficientie);

5. Lipolysis (NLD: lipolyse);

6. fat absorption (NLD: vetabsorptie).

Ondersteuning

Primaire sponsor: Investigator initiated

Onderzoeksproduct en/of interventie

Uitkomstmaten

Primaire uitkomstmaten

1. Fecal fat absorption coeficient;
2. Serum isotopes concentrations and appearance curves.

Toelichting onderzoek

Achtergrond van het onderzoek

The fecal fat balance is the current gold standard for evaluating fat malabsorption in CF patients. However there is a need for a simpler, sensitive and less restraining test to determine fat absorption in CF patients. More insight in the relative contribution of lipolysis and intestinal malabsorption of free fatty acids to fat malabsorption in CF patients would give way for a more directed therapeutic approach.

The aim if the this study is to proof that the double labeled triglyceride and free fatty acid fat absorption test is as effective as the fecal fat balance as a quantitative diagnostic test for intestinal fat absorption in CF patients.

In the study we use triglyceride and free fatty acid both labeled with a different stable isotope. The double labeled triglyceride and free fatty acid fat absorption test is based principle of simultaneous admission of both the labeled triglyceride and labeled free fatty acids. The resulting appearance curve in the plasma determines the absorption of the separate components and is an indication for intestinal fat absorption.

Doel van het onderzoek

The double labeled triglyceride and free fatty acid fat absorption test is as effective as the fecal fat balance as a quantitative diagnostic test for intestinal fat absorption in CF patients.

Onderzoeksopzet

N/A

Onderzoeksproduct en/of interventie

N/A

Contactpersonen

Publiek

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Wetenschappelijk

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Deelname eisen

Belangrijkste voorwaarden om deel te mogen nemen (Inclusiecriteria)

1. Cystic fibrosis patients;

2. Age: 2 -18 years;

3. Pancreatic insufficiency.

Belangrijkste redenen om niet deel te kunnen nemen (Exclusiecriteria)

1. Cystic fibrosis related liver disease;

2. Pulmonary (non-)infectious exacerbation;

3. Use of gastric acid-suppressive medications.

Onderzoeksopzet

Opzet

Type:	Interventie onderzoek
Onderzoeksmodel:	Anders
Toewijzing:	Gerandomiseerd

Controle: N.v.t. / onbekend

Deelname

Nederland

Status:	Werving gestart
(Verwachte) startdatum:	01-03-2007
Aantal proefpersonen:	35
Type:	Verwachte startdatum

Ethische beoordeling

Positief advies

Datum:	06-02-2007
Soort:	Eerste indiening

Registraties

Opgevolgd door onderstaande (mogelijk meer actuele) registratie

Geen registraties gevonden.

Andere (mogelijk minder actuele) registraties in dit register

Geen registraties gevonden.

In overige registers

Register	ID
NTR-new	NL877
NTR-old	NTR891
Ander register	: 1
ISRCTN	incomplete

Resultaten

Samenvatting resultaten

1. Rings EH, Minich DM, Vonk RJ, Stellaard F, Fetter WP, Verkade HJ.
Pediatr Res. 2002 Jan;51(1):57-63.
Functional development of fat absorption in term and preterm neonates strongly correlates with ability to absorb long-chain Fatty acids from intestinal lumen;
2. Kalivianakis M, Minich DM, Bijleveld CM, van Aalderen WM, Stellaard F, Laseur M, Vonk RJ, Verkade HJ.
Am J Clin Nutr. 1999 Jan;69(1):127-34.
Fat malabsorption in cystic fibrosis patients receiving enzyme replacement therapy is due to impaired intestinal uptake of long-chain fatty acids.

Bijvelds MJ, Bronsveld I, Havinga R, Sinaasappel M, de Jonge HR, Verkade HJ
Am J Physiol Gastrointest Liver Physiol. 2005 Apr;288(4):G646-53.
Fat absorption in cystic fibrosis mice is impeded by defective lipolysis and post-lipolytic events