Peanut sensitization, the relationship with peanut-related symptoms and asthma in children

Published: 14-06-2011 Last updated: 27-04-2024

- To determine the association between peanut sensitization and food related physical symptoms - To determine the association between peanut sensitization and the severity of

asthma in children

Ethical reviewApproved WMOStatusRecruitment stoppedHealth condition typeAllergic conditions

Study type Observational non invasive

Summary

ID

NL-OMON35756

Source

ToetsingOnline

Brief title

Peanut sensitization, peanut-related symptoms and asthma

Condition

- Allergic conditions
- Bronchial disorders (excl neoplasms)

Synonym

hypersensitivity reaction, intolerance

Research involving

Human

Sponsors and support

Primary sponsor: Isala Klinieken

Source(s) of monetary or material Support: eigen middelen

1 - Peanut sensitization, the relationship with peanut-related symptoms and asthma i ... 17-06-2025

Intervention

Keyword: Asthma, Food-related symptoms, Peanut, Sensitization

Outcome measures

Primary outcome

The association between peanut sensitization and food related symptoms in children

- -The absence of peanut allergy, as determined by a questionnaire and interview
- -The level of peanut peanut sensitization, as determined by laboratory tested

IgE

-The presence of sensitization of allergens beside peanuts

Secondary outcome

The association between peanut sensitization and asthma in children

- -The percentage of children with a combination peanut sensitization and asthma
- -The severity of the asthma

Study description

Background summary

The diagnosis of food allergy is complicated. The patient*s medical history as obtained by a relative is often unreliable and laboratory tests can only show sensitization. While double-blind placebo-controlled food challenges remain the "gold standard" in food allergy diagnosis, logistic and practical difficulties make it less applicable for daily practice. As a result, the test is not used often, possibly causing many false positive diagnoses of food allergy in children, unnecessary elimination diets and their consequences. The exact association between food related symptoms, sensitization and food allergy is currently unknown.

Food allergy is part of the atopic syndrome. It is known that children with asthma and food allergy have an increased risk of developing an anaphylactic reaction after exposure to the food allergen. Therefore, identification of

children with a combination of food allergy and (unknown) asthma is important to counsel parents on the risk of developing anaphylaxis.

The aim of our study is to improve our ability to interpret the laboratory results of food sensitization in a clinical situation. This will help us in the future to determine which children will develop food related physical symptoms. Further, a second aim of the study is to determine the association between peanut sensitization, peanut allergy and the severity of asthma.

Study objective

- To determine the association between peanut sensitization and food related physical symptoms
- To determine the association between peanut sensitization and the severity of asthma in children

Study design

Prospective cohort

Intervention

The parents of the participating children will fill out two validated questionnaires. The first is regarding their child*s exposure to peanut and his food related physical symptoms. The second is about astma related physical symptoms. Based on the first questionnaire, we will decide if there is a possibility of a true peanut allergy or not. In case this could be present, they and their child (if >6 years) are invited to visit the out-patient clinic of the Amalia pediatric department for an interview. During this interview the child*s exposure to peanuts and it*s symptoms will be discussed in more detail. If asthma-related symptoms excist, this will also be discussed in more detail. Children six years of age or older will participate in a lung function test as well.

If there still is suspicion of true peanut allergy after this interview and the child is four years of age or older, parents will be offer for their child to participate in a double-blind placebo-controlled food challenge to diagnose the existence of the allergy.

This is not a component of this study, it will be regular patientcare.

Study burden and risks

A disadvantage of participation will be the time involved. The participants and/or their parents will complete a questionnaire, and will be seen at the pediatrics department up to 1 time. This will be an interview and a lung

function test.

However, as stated before, there will be a possibility to clarify their peanut sensibility and possibly their asthma-related symptoms.

This study will investigate the peanut sensitization in children. We are specifically interested in the symptoms of peanut-allergy in children. We can not extrapolate the symptoms of adults to children.

Contacts

Public

Isala Klinieken

Klooienberglaan 12 8031GJ Zwolle NL

Scientific

Isala Klinieken

Klooienberglaan 12 8031GJ Zwolle NL

Trial sites

Listed location countries

Netherlands

Eligibility criteria

Age

Adolescents (12-15 years) Adolescents (16-17 years) Adults (18-64 years) Children (2-11 years) Elderly (65 years and older)

Inclusion criteria

All children with a positive IgE-test for peanut-allergens, as tested by the clinical laboratory of the Isala Klinieken, between Januari 2004 and May 2010 and aged 18 years or younger at time of the IgE test.

Exclusion criteria

serious comorbidity

Study design

Design

Study type: Observational non invasive

Masking: Open (masking not used)

Control: Uncontrolled

Primary purpose: Diagnostic

Recruitment

NL

Recruitment status: Recruitment stopped

Start date (anticipated): 20-06-2011

Enrollment: 425

Type: Actual

Ethics review

Approved WMO

Date: 16-06-2011

Application type: First submission

Review commission: METC Isala Klinieken (Zwolle)

Study registrations

Followed up by the following (possibly more current) registration

No registrations found.

Other (possibly less up-to-date) registrations in this register

No registrations found.

In other registers

Register ID

CCMO NL35883.075.11