

Mechanisms of the Development of ALLergy (MeDALL)

Summary:

MeDALL is funded by the European Union's 7th Framework Programme. The objective is to understand the mechanisms of allergy development, in order to make recommendations for early allergy diagnosis, prevention and therapy. The project followed a novel analytical approach to define new subgroups of allergic phenotypes. Furthermore, MeDALL combines epidemiological data collected by European birth cohorts and approaches of experimental working groups, with a focus on basic research which is needed to understand how a network of molecular and environmental factors interact in the initiation of allergy.

The Institute of Epidemiology, Social Medicine and Health Economics developed together with several birth cohorts harmonized questionnaires and SOPs for clinical investigations for a common follow-up of 12 European birth cohorts with children and adolescents.

We will investigate (1) late-onset allergies as an effect of change in environment (road traffic exposure during childhood), (2) the sex-switch of allergy prevalence during adolescence, (3) the effect of environmental tobacco smoke exposure during perinatal, early and late childhood allergy development and persistence.

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