

What are mycotoxins and their effects in human health?

Mycotoxins are metabolites produced by fungi such as *Aspergillus*, *Fusarium* and *Penicillium*.

They can contaminate a diversity of food products, leading to teratogenic, carcinogenic, neurotoxic and immunosuppressive effects, impacting human health or even leading to death.



PARTICIPANTS:

MYCOMIX



Exploring the toxic effects of mixtures of mycotoxins in infant food and potential health impact

2013 - 2015

Principal Investigator : **Paula Alvito**

National Institute of Health Doutor Ricardo Jorge I.P.

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Are Portuguese children exposed daily to one or several mycotoxins through food?

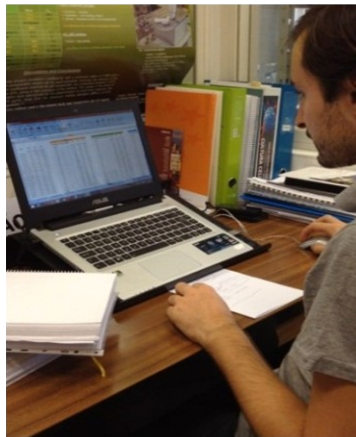
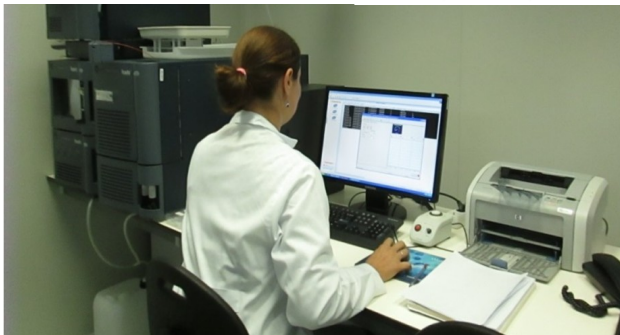
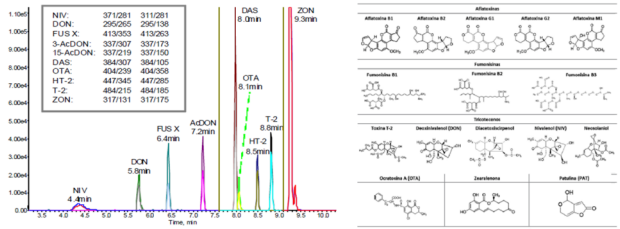
Can this co-exposure affect children's health?

Are there interactions between mycotoxins? Would they affect its bioavailability? And their toxicity?

- ✓ Determination of mycotoxins in infant food commercialized in Lisbon region, by liquid chromatography coupled to mass spectrometry.

- ✓ Pilot study of food consumption in children (0-3 years) in the Cidadela Primary Health Care Unit, Cascais
- ✓ Probabilistic evaluation of the exposure to mycotoxins

- ✓ *In vitro* simulation of the digestion and intestinal absorption
- ✓ Interaction mechanisms and cyto- and genotoxic effects of binary mixtures of mycotoxins



PROJECTO MYCOMIX
 Instituto Nacional de Saúde Doutor Ricardo Jorge I.P.

Avaliação dos Hábitos Alimentares, do Estado Nutricional e da Probabilidade de Exposição a Contaminantes na Alimentação Infantil

Crianças dos 0 aos 3 anos
 O que comem? Quanto comem?

Este estudo tem como objetivo a caracterização do consumo de alimentos e a garantia a confiabilidade dos dados.

Investigador Responsável: Doutora Paula Alvim

Entidades Promotoras:

Entidades Financiadoras:

