

## GIS-based information system for the prediction of the risk of mycotoxin contamination in cereals

### Riferimenti

Tipo di progetto

Gruppo Operativo

Acronimo

SERVICE

Tematica

Difesa da malattie e infestazioni

Information

Time frame

2019 - 2023

Durata

51 months

Partners (no.)

5

Regione

Emilia-Romagna

Comparto

Cerealicoltura

Localizzazione

ITH51 - Piacenza

ITH56 - Ferrara

ITH58 - Forlì-Cesena

Costo totale

€248.493,25

Fonte di finanziamento principale

Programma di sviluppo rurale

Programma di sviluppo rurale

2014IT06RDRP003: Italy - Rural Development

Programme (Regional) - Emilia Romagna

Parole chiave

Pest /disease control

Food quality / processing and nutrition

Agricultural production system

Sito web

<https://rinova.eu/it/progetti/service-previsione-delle-micotossine-nei-cereali/>

Project status

completed



### Objectives

The management of the risk of contamination by mycotoxins remains, in particular on maize, the key problem of cultivation at national level to obtain a high quality production. The project involves the improvement of the joint risk prediction model from mycotoxins (aflatoxins/fumonisin) and the construction of a GIS-based IT platform that allows agricultural companies and technical assistance structures to consult territorial maps, rather than synthetic indexes, regarding the risk, during the harvesting, of contamination from mycotoxins in cereals

### Activities

This objective will be pursued by evaluating, both in the field and in the laboratory, some genotypes in an advanced selection phase. Overall, there are about 50 apple and pear tree selections, for which it is therefore intended to continue the evaluation, both in integrated and organic cultivation, in order to express an opinion about the possible commercial diffusion of the most promising ones. The fruits of the potential new varieties will also be subject to a panel test and consumer test, in order to verify the level of satisfaction and the propensity to purchase by the consumer.

# Sistema informativo GIS-based per la previsione del rischio di contaminazione da micotossine nei cereali

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<https://www.innovarurale.it/pei-agri/gruppi-operativi/bancadati-go-pei/sistema-informativo-gis-based-la-previsione-del-rischio>

## Partenariato

| Role    | Azienda                                                 | Address                                              | Telephone   | E-mail                      |
|---------|---------------------------------------------------------|------------------------------------------------------|-------------|-----------------------------|
| Leader  | CRPV Soc. Coop. Centro Ricerche Produzioni Vegetali     | Via dell'Arrigoni 120<br>47522 Cesena FC<br>Italy    | 0547313571  | ortofrutticola@crpv.it      |
| Partner | Agronica group s.r.l.                                   | Via Calcinaro 2085<br>47521 Cesena FC<br>Italy       | 0547 632933 | com@agronica.it             |
| Partner | DINAMICA s.c.a r.l.                                     | Via Bigari 3<br>40128 Bologna BO<br>Italy            | 051 360747  | info@dinamica-fp.it         |
| Partner | Grandi Colture Italiane Società cooperativa agricola    | Via Eridano 4/A<br>44122 Ferrara FE<br>Italy         | 0532747811  | scudellari@grandicoltore.it |
| Partner | Università Cattolica del Sacro Cuore - Sede di Piacenza | Via Emilia Parmense 84<br>29122 Piacenza PC<br>Italy | 0523 599121 | uff.ricerca-pc@unicatt.it   |

## Pratiche abstract

### Description

The main results expected are:

- Creation of a GIS-based IT platform with controlled access allowing the technical and / or storage structure or the agricultural producer to consult territorial maps of mycotoxin risk relative to the farms or areas of their competence.
- Automation of risk forecasts with the daily import of meteorological data from the regional meteorological service network and from any corporate weather sensor
- Improvement of the organization of the harvest based on the risk forecast, rationalizing also the postharvest logistics and the choice of destination of use of the products obtained and concentrating grain sampling and analysis in areas in potentially high-risk area.

## Link utili

| Titolo/Descrizione    | Url                                                                                                                                                                           | Tipologia |
|-----------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------|
| Sito web del progetto | <a href="https://rinova.eu/it/progetti/service-previsione-delle-micotossine-nei-cereali/">https://rinova.eu/it/progetti/service-previsione-delle-micotossine-nei-cereali/</a> | Sito web  |

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| Titolo/Descrizione                                                                     | Url                                                                                                   | Tipologia       |
|----------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------|-----------------|
| Video del progetto                                                                     | <a href="https://www.youtube.com/watch?v=BsSUxiBCY2I">https://www.youtube.com/watch?v=BsSUxiBCY2I</a> | Materiali utili |
| Video Tutorial consultazione DSS per la previsione del rischio micotossine nei cereali | <a href="https://www.youtube.com/watch?v=BsSUxiBCY2I">https://www.youtube.com/watch?v=BsSUxiBCY2I</a> | Materiali utili |