



Organic grape production

 Enhancing organic grape production through a more efficient control of the grape diseases

Vineman.org





Title of the project:

integration of plant resistance, cropping practices and biocontrol agents for enhancing disease management, yield efficiency and biodiversity in organic European vineyards.



Introduction

The major result from the Project is the development of innovative cropping strategies and techniques able to solve one of the main issues the European organic grape-producers face, i.e. growing healthy plants.

What: Development of new and efficient strategies for controlling grape diseases based on environmentally friendly and durable methods.

Why: Insufficient disease control is often the main reason for growers to abandon organic production.

Where: Italy, Spain, Germany, Austria and Slovenia.

Background

Insufficient disease control is often the main reason for growers to abandon organic production. The progressive reduction of copper fungicides (Council Regulation (EEC) 2092/91, Annex II) further increases this problem.

Benefits of the project

Development of new and efficient strategies for controlling grape diseases based on environmentally friendly and durable methods, such as plant resistance, cultural practices, and biocontrol agents will provide to the EU grape growers new opportunities for entering/remaining in this sector, in that the disease management will be enhanced and therefore the yield loss due to pathogens decreased.









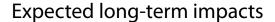


Expected results

Presentation in international and national conferences will be held to communicate with other researchers which are interested in the same research field; publications in peer-reviewed journals with Impact Factor will be written to show the high quality of the research performed within the project; a final Congress will be organized to present the results and the holistic approach of the research for managing the organic vineyards.

A project web-site will be implemented which shows the project partners, aims, contents, progresses, and results.

Considering that farmers are searching more and more information from Internet, the web-site will be enriched with presentations and videos showing results of practical interest for them. Project leaflets will be also prepared in English and translated in Italian, Spanish, German, and Slovenian. Articles in professional magazines and journals will be published and workshops will be organized with stakeholders and end-users. Finally, presentations will be prepared for broadcasting media in such a way to reach a big audience, including consumers, and make the research area familiar to them.



The results of the project should have a large impact on the European organic viticulture, due to the increasing interest for this sector.

Target groups

In Europe, most of the countries registered growths between 5 and 15% annually in the consumption of organic wine. More and more growers are interested to the organic viticulture and consequently more and more stakeholders and end-users.

Canada has the best potential market for organic wine (consumption grew of around 20% in recent years); USA (sales of organic wine reach about 26 billion dollars a year) and Brazil also shows constant growth figures.





Main activities

Methods for inducing the innate immunity of plants against the main pathogens and the effect of some viticulture management options on the development of the key diseases (downy and powdery mildews, bunch rots) and will be evaluated. The relationships between the target pathogens and the environmental conditions will be studied to develop weather-driven, mechanistic models for predicting plant disease epidemics. The fitness and efficacy against the main grape diseases, will be evaluated in four biocontrol agents. New strategies based on design-assessment-adjustment cycle will be developed and tested in field trials. Finally, the microbial communities present on grape leaves and berries will be evaluated and monitored.





Coordinator

Associated Professor Vittorio Rossi, Università Cattolica del Sacro Cuore, Italy E-mail: vittorio.rossi@unicatt.it

Partners

Director Paolo Storchi, CRA - Agricultural Research Council, Italy Head of Department Helga Reisenzein, Institute of Plant Health, Austria Head of Department Hanns-Heinz Kassemeyer, Staatliches Weinbauinstitut, Associate Professor Javier Tardaguila, University of La Rioja, Spain Professor Emilio Montesinos, University of Girona, Spain PhD Hans-Josef Schroers, Agricultural Institute of Slovenia, Slovenia Dr. Franz G. Rosner, Education and research centre for enology and pomology, Professor Joseph Strauss, University of Natural Resources and Life Sciences, Austria

Related projects

The Project will take advantage from the experience gained and by valorising the results obtained in two previous EU projects:

- 1. WINE-OCHRA RISK: Risk assessment and integrated ochratoxin A (OTA) management in grape and wine (QLK1-CT-2001-01761)
- 2. BCA_grape: New biocontrol agents for powdery mildew on grapevine (FP7-SME-2007-1). The Project will exchange experience and methods with two ongoing EU projects focused on IPM:
- MoDem_IVM: A web-based system for real-time Monitoring and Decision Making for Integrated Vineyard Management (FP7-SME-2010-1);
- 4. PURE: Pesticide Use and risk Reduction in European farming systems with IPM (FP7-KBBE-2010-4).

Project dissemination

Professional magazines and journals for vine growers, advisors, consumers, etc. in different countries, and via the website: www.vineman-org.eu

How to reach the endusers

The main means to reach the target groups will be the project Web-site and leaflet, the organized workshops and congress and the publications in technical journals.

The impact will be tailored through the number of access to the web-site and the download of the leaflets and documents. Moreover the number of participants to the workshops and the final congress will recorded and a satisfaction questionnaire will be distributed.



Further information

This project is funded via the ERA-net CORE Organic II by national funds to each partner. CORE Organic II is a collaboration between 21 countries on initiating transnational research projects in the area of organic food and farming. In 2011, CORE Organic II selected this project and 10 more for funding.

Read more about the project at the CORE Organic II website: http://www.coreorganic2.org/Vineman.Org and in Organic Eprints: http://orgprints.org/view/projects/Vineman.html