

1. Content of the 'Topic Description' document

1.1. Topic area

Management of pest/vector

1.2. Links to the Euphresco Strategic Research Agenda

The topic addresses the following objective(s) of the 2017-2022 Euphresco Strategic Research Agenda:

Objective 2017-R-7.2: to validate cost-effective and socially acceptable phytosanitary measures at the place of production (inland) for plants, plant products, water and soil

1.3. Topic title

Countering quarantine viruses and viroids through cleaning and disinfection

1.4. Description of the problem the research should solve

Cleaning and disinfection of tools and greenhouse surfaces are recommended for official control against a number of viruses such as *Tomato brown rugose fruit virus* (ToBRFV) or viroids such as *Potato spindle tuber viroid* (PSTVd). However, a limited number of products are available, and efficacy evaluation data of such products are not always publicly available or consistent. Furthermore, efficacy might depend on the concentration, surface characteristics, contact time, viral load and the presence of organic matter. This can hamper defining an optimal cleaning and disinfection protocol. In addition, biocidal products must comply with the EU Regulation 528/2012 of 2012-05-12 concerning the making available on the market and use of biocidal products. The Euphresco project should aim at:

- Gathering all relevant available information on disinfectants and protocols for cleaning and disinfection through literature review and transnational exchange of knowledge;
- Identifying knowledge gaps;
- Performing additional experiments on a number of viruses and viroids to identify optimal cleaning and disinfection protocols for their eradication;
- Proposing and validating cleaning and disinfection protocols against quarantine viruses and viroids, taking into account cultivation- and climate-specific conditions;
- Dissemination activities;

The project should not focus on disinfection of soil and seeds. Instead, it should define optimal cleaning and disinfection of equipment and tools (including containers, trays, shoes, machineries), greenhouses surfaces (including irrigation systems) and the workers' skin.

The development of authorization dossiers for new disinfectants is out-of-scope of the project.

1.5. Description of the expected results

Validated protocols for cleaning and disinfection against quarantine viruses and viroids.

1.6. Beneficiaries of this research product

- National Plant Protection Services
- Horticultural sector
- EPPO and its members

Results of this project could be considered to revise e.g. EPPO Standard PM 10/1 *Disinfection procedures in potato production* and EPPO Standard PM 9/13 *Potato spindle tuber viroid on potato* and contribute to the development of new PM 10 Standards.



1.7. Research funders and research contribution/ distribution

Funding organisation	Research activity and researchers involved
<p>1. Federal Public Service of Health, Food Chain Safety and Environment, Belgium</p> <p>Ria Nouwen ria.nouwen@health.fgov.be</p>	<p>Potential research activities to be confirmed after national VP-selection & peer review</p> <ul style="list-style-type: none"> -Contribute to a comprehensive literature survey; -Contribute to the transnational exchange of knowledge; -Validation of disinfectants against ToBRFV and / or PSTVd; -Testing of new disinfectants against ToBRFV and / or PSTVd; -Optimisation and/or validation of new cleaning and disinfection protocols; -Participation in test performance studies; -Dissemination of results to end users and Belgian authorities; <p>Researchers involved to be confirmed after national VP-selection</p>
<p>2. European and Mediterranean Plant Protection Organization, France</p> <p>Françoise Petter petter@eppo.int</p>	<ul style="list-style-type: none"> -Follow-up of the project and feedback on the discussions relevant to the project which took place during the EPPO meetings; -Depending on the outcomes of the Project, the revision and development of new EPPO Standards could be included in EPPO work programme. This may include the development of new PM 10 Standards, the Revision of EPPO Standard PM 10/1 <i>Disinfection procedures in potato production</i> and EPPO Standard and the Revision of PM 9/13 <i>Potato spindle tuber viroid on potato</i> (table of disinfectants); <p>Contact person: Camille Picard E-mail address: cp@eppo.int</p>
<p>3. Ministry of Agriculture and Rural Development, State of Israel</p> <p>Abed Gera AbedG@moag.gov.il</p> <p>Yael Meller Harel YaelM@moag.gov.il</p>	<p>-Research activities to be detailed;</p> <p>Contact person: Aviv Dombrovsky E-Mail address: aviv@volcani.agri.gov.il</p>



<p>4. Netherlands Food and Consumer Products Safety Authority, The Netherlands</p> <p>Martijn Schenk M.Schenk1@nvwa.nl</p>	<p>-Research activities to be detailed;</p>
<p>5. All Russian Plant Quarantine Center, Russian Federation</p> <p>Yuri Shneyder yury.shneyder@mail.ru</p>	<p>-Research activities to be detailed;</p>
<p>6. Department for Environment, Food and Rural Affairs, United Kingdom</p> <p>Iain Dummett Iain.Dummett@defra.gov.uk</p>	<p>-Contribute to literature review covering previous Fera work on disinfection of PSTVd and ToBRFV;</p> <p>-Investigate relationship between ‘test results’ and biological activity post disinfection studies;</p> <p>-Disseminate best practice to UK growers through UK ToBRFV steering group and growers associations;</p> <p>Contact person: Adrian Fox E-mail address: adrian.fox@fera.co.uk</p> <p>Contact person: Anna Skelton E-mail address: Anna.skelton@fera.co.uk</p>
<p>7. Department of Agriculture, Animal and Plant Health Inspection Service, United States of America</p> <p>David Schimmelpfennig david.schimmelpfennig@usda.gov</p>	<p>-Research activities to be detailed</p>

1.8. Research project partnership outside Euphresco

Euphresco funding ensures a certain level of transnational collaboration among Euphresco member countries. It is possible, if the funding consortium is interested, to contact funding organisations or research groups outside the geographical area covered by Euphresco members. The Euphresco coordinator could advertise the research topic in order to have an enlarged collaboration. If funders are interested in this possibility, please check the case below:

The funding consortium of the topic mentioned in section 1.2 requires that the topic is advertised outside the Euphresco network

1.9. Any other relevant information on content

None.

2. Euphresco management aspects of the project

2.1. Indication of the topic budget

Funding organisation ^a	Mechanism ^b	Total Budget ^c
1. FPS (BE)	NC/VP	€
2. EPPO (FR)		€
3. MARD (IL)		€
4. NVWA (NL)		€
5. VNIKR (RU)		€
6. MAFF (SI)		€
7. DEFRA (GB)		€
8. APHIS (US)		€
total		€

2.2. Expected duration of the project (only for non-competitive topics)

24 months

2.3. Identification of project coordinator

Has the research project coordinator been identified?

Yes

No, national call launched and proposal under evaluation

2.4. Any other relevant information on topic organisation and management

None.

^a First member is project coordinator. A minimum of two partners are necessary for each proposal. Add lines as needed.

^b Please indicate the preferred mechanism (e.g. real pot RP; virtual pot VP; non-competitive NC), or several mechanisms if there is flexibility.

^c Optional, as this amount can still change in the next phase. In-kind contribution should also be indicated in this column.