



REDUCTION OF POINT SOURCE WATER POLLUTION DUE TO PLANT PROTECTION PRODUCTS

PFLANZENSCHUTZ – FITOFARMACO

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Europäischer Landwirtschaftsfonds für die Entwicklung des ländlichen Raums: Hier investiert Europa in die ländlichen Gebiete EU-Verordnung 1305/2013

Fondo Europeo Agricolo per lo Sviluppo Rurale: l'Europa investe nelle zone rurali – Regolamento (UE) n. 1305/2013

AIMS OF THE PROJECT

- Sustainable use of PPP in pomiculture and viticulture in South Tyrol and Trentino
- Development of economically and ecologically sustainable solutions for the cleaning and filling of sprayers
- Prevention of point source water pollution

Analysis of the current situation

Water stream pollution

General good quality ...

Autonomous provinces of Bolzano and Trento

Contamination level

- Above the limit
- Within the limit
- Not quantifiable

... but some specific problems



OG MEMBERS



The Regional rural landscape



- Cultivated surface (vine+apples):
44.305 ha
- N° of farms: approx. **25.000** units
- **Average surface: < 2 ha**
- High fragmentation (number of plots per farm)
- Strong cooperative spirit



Analysis of the current situation

- Compilation of current methods of filling and cleaning of sprayers
→ Interviews with farmers



RESULTS (N = 339)

- External washing:
 - average of **12 times/year**
- Internal washing:
 - average of **9 times/year**
- Interest in collective washing:
 - 72 %**
- Willingness to travel to a collective system:
 - average of **3 km**
- Intended use of washing facility:
 - average of **8 times/year**

Analysis of the current situation

- Compilation of current methods of filling and cleaning of sprayers
- Interviews with farmers
- Identification of the necessary requirements for new, environmentally friendly methods

NATIONAL ACTION PLAN
(Sustainable use of Pesticides)

Dirigete: Paolo Ficca
RIFIUTI BOLLETTINO
DI INFORMAZIONE
NORMATIVA
Edizioni Ambiente

**MINISTERIAL
OPINIONS**

Prassi

Realizzazione centri lavaggio di irroratrici e mezzi per i trattamenti fitosanitari

Ministero dell'ambiente e della tutela del territorio e del mare
Risposta MinAmbiente a quesito aprile 2018

Oggetto: Realizzazione di centri di lavaggio delle irroratrici e dei mezzi utilizzati per l'esecuzione dei trattamenti fitosanitari

Una Provincia ha chiesto al Ministero dell'ambiente se i centri di lavaggio di macchine irroratrici di prodotti fitosanitari necessitano di una qualche autorizzazione ambientale.

Dalla descrizione dell'attività che l'Ente provinciale ha fatto al Ministero appare che presso tali centri di lavaggio non sembrano essere esercitate solo operazioni che si limitano a un trattamento di lavaggio esterno dei mezzi, ma sono previste anche la pulizia delle parti interne delle macchine irroratrici, e dunque lo svuotamento del serbatoio e del circuito idraulico che è presumibile contengano residui di miscele fitoiatriche.

A parere del Ministero le operazioni di "lavaggio a ciclo chiuso" che si intendono eseguire presso questi centri sembrano inquadrabili tra le operazioni di smaltimento dei rifiuti, e

Individual solution

Small-scale device to support the needs of one farm

- Washing in the field
 - Additional devices which can be attached to sprayers for washing
 - Sprayer with a big tank for internal and external washing

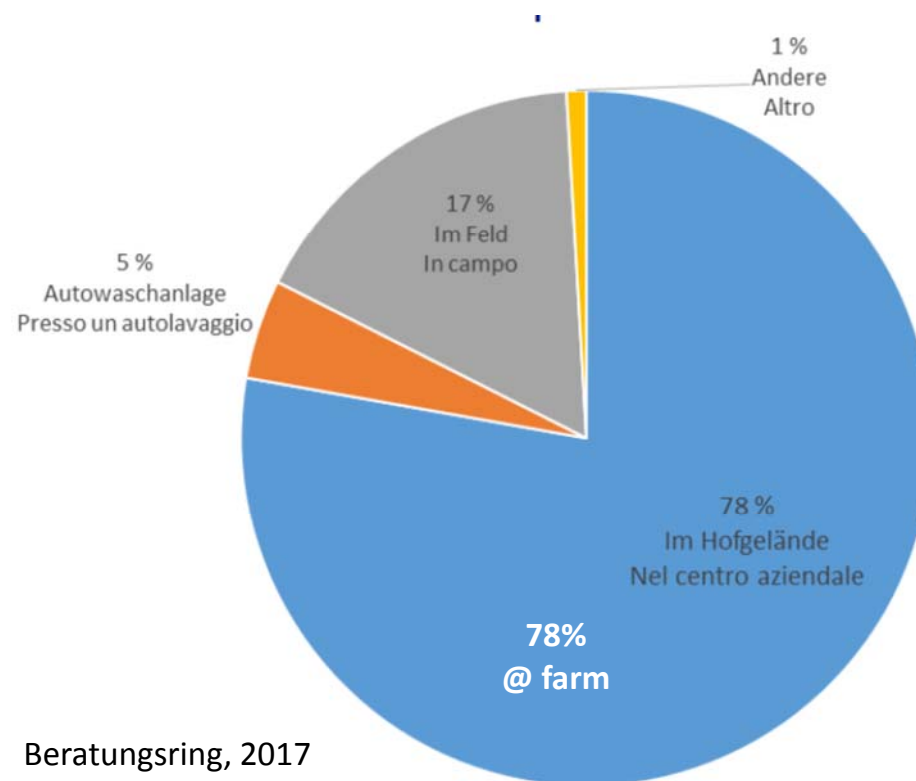


Individual solution

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Where is performed the external cleaning?



Individual solution

Small-scale device to support the needs of one farm



- Solutions "at farm"
 - Mobile inflatable platform and tank for collecting and storing contaminated waters, respectively
 - Permanent washing platform
 - Agri-BioBed, Biofilter, Phytobac, Phytosec, Heliose, etc.



Systematic characterization of existing solutions available on the market



Advantages:

- Compactness
- Modularity
- Smell mitigation
- Lightness of the bags
- Presence of accidental spillage tank

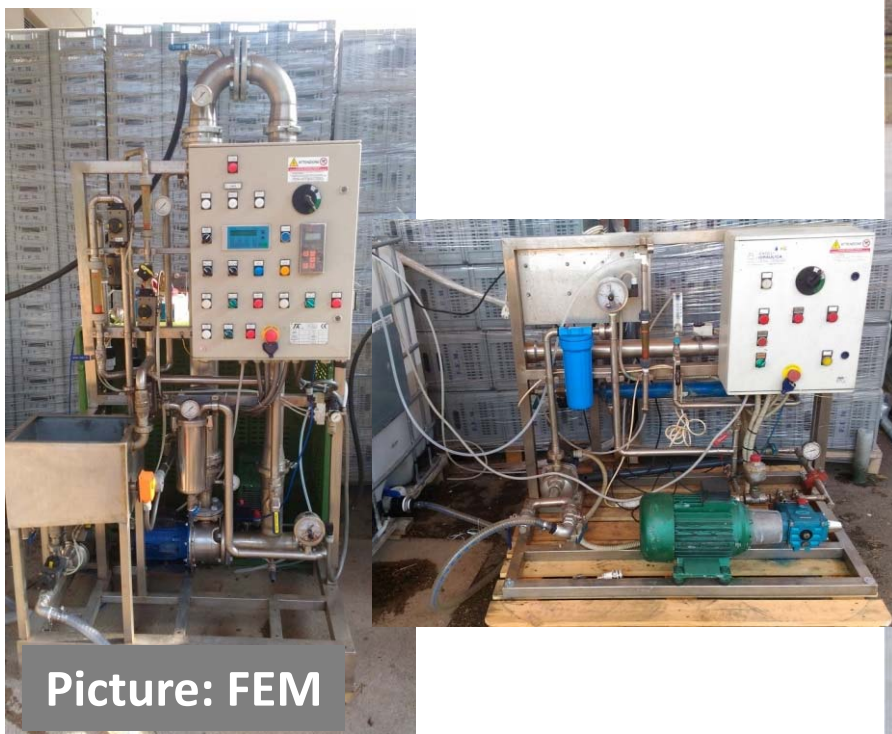
Observations:

- Cover removed due to strong wind
- Accumulation of rainwater in the anti-spillage tank

Collective solution

Several farms share same device

- DVDEP+
- Bf Bulles
- Ultrafiltration systems



Plan for implementation

Validation of solutions



Dissemination of results

Information events



Plan for implementation

Elaboration of guidelines and didactic tools for practical implementation

GUIDE PRATIQUE

Stratégie de gestion des déchets issus du traitement des effluents de produits phytosanitaires



TOPPS

best Practice, better Water Protection

Prevent water contamination through point sources

Demonstrations

Befüllen und Reinigen der Spritze – wie mache ich das richtig?

Beim Befüllen und Reinigen von Feld- und Gartenspritzern besteht die Gefahr, dass kontaminierte Pflanzenschutzmittel (Pflanz) oder von Pflanzenschutzmitteln kontaminierte Gegenstände gelangen können. Um diese Gefahr zu vermeiden, ist es wichtig, die Spritze vor dem Befüllen und Reinigen sorgfältig zu reinigen und die Spritze nach dem Gebrauch zu desinfizieren. In der folgenden Tabelle sind die wichtigsten Schritte zur Befüllung und zum Reinigen einer Spritze dargestellt.

In vier Schritten zur besten Lösung für das Befüllen und Reinigen der Spritze

1. Bereinigung des Arbeitsbereichs
2. Befüllen der Spritze
3. Desinfizierung des Spritzgeräts
4. Waschen des Spritzgeräts



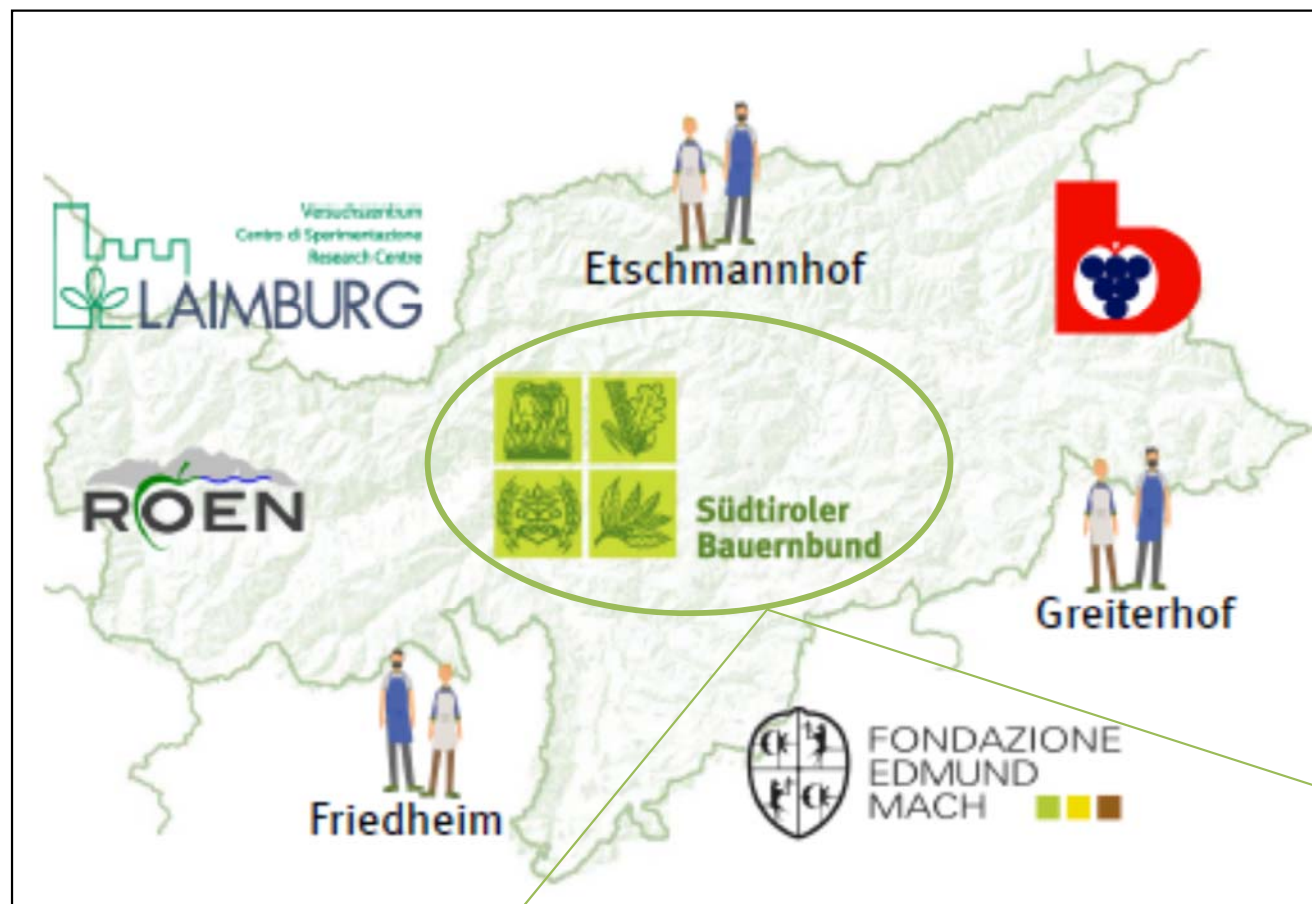
Work in progress

Support of local pilot initiatives



Visits to farms which are already using purification devices (picture: SBB)

For any other information



Thank you
for listening

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