



ONLINE CROSS-COUNTRY MEETING  
ON AGRICULTURAL RESEARCH, INNOVATION AND TECHNOLOGY TRANSFER  
IN THE WESTERN BALKANS: TOWARDS POLICY RECOMMENDATIONS

CASE STUDY OF FEDERATION OF BOSNIA AND HERZEGOVINA  
CULTIVATION OF BLUEBERRIES ON INFERTILE/DEGRADED SOILS  
USING PLANT POTS

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- Strengths versus Weaknesses of the case
- Opportunities versus Threats of the case
- Ways to overcome Weaknesses and Threats of the case in order to successfully implement this case on a much broader scale

# Summary of innovation case

## Basic information of innovation

- Technological innovation promoted within the FAO/GEF (Global Environment Facility) Project "Decision Support for Mainstreaming and Scaling Up of Sustainable Land Management,, related to the dissemination of sustainable land management (SLM) technologies.
- Innovation selected for local, regional and global promotion because of its technological-productive effects, innovative approach, and mostly because of its potential to be applied on soils of low or dramatically compromised fertility for highly profitable agricultural production.
- During field research and through contacts with farmers, municipal agricultural services and representatives of local authorities, the project team (FAFS/UNSA) identified and preliminary described and specified four practices and approaches with potential for promotion in the category of sustainable land management technologies.
- WOCAT (World Overview of Conservation Approaches and Technologies) reviewers selected two SLM technologies, among which is the number 4126 technology "Cultivation of blueberries on infertile/degraded soils using plant pots".



# Summary of innovation case

## Key actors involved

- FAO - Financed project
- Global Environment Facility (GEF) -Financed project
- University of Sarajevo, Faculty of Agriculture and Food Sciences - Project implementation - Finding, specifying and promoting SLM technology
- Municipality of Zivinice (Department of Local Economic Development, Finance and Treasure) - Administrative and logistical support
- Ministry of Agriculture of Canton Tuzla - Administrative and logistical support
- Fruit production company "Elisa Berry,, - Inputs for SLM technology specification and detailed description
- WOCAT - Expert review of the proposed SLM technology; hosting of the SLM technology on the global platform



# Summary of innovation case

## Description of technology innovation

- The plant pots with blueberry plantings are placed in rows of low trenches with a distance of 100-120 cm between the plant pots (from center to center) and 250-300 cm between rows.
- The plant pots (60 to 90 liters) are placed in later formed embankments (trussing with the original soil), thus ensuring the stability of the plant pots (e.g. from wind) and more favorable temperature and humidity conditions of the substrate in the plant pots.
- The technology implies possession and use of the drip irrigation system, using the water collected in accumulations and distributed from tanks situated on the farm.
- The technology offers relatively innovative use of infertile or degraded soils for the intensive and profitable production of blueberries or other crops, primarily berry fruits.



# Summary of innovation case - Photos



# Strengths of the case

- Close cooperation and enthusiasm of all project partners
- Expert approach with full confidence in the experiences and valuable suggestions of people from the field (producers, local administration)
- The participation of goodwill actors from different levels (farmers, international organizations, academia, local administration) was, at least in this case, extremely mutually motivating

# Weaknesses of the case

- The promoted SLM technology requires relatively high initial investments and highly skilled fruit producers



# Opportunities of the case

- The SLM technology mentioned here is just one of probably many others that deserve to be promoted
- The promoted SLM technology, in addition to its role in dealing with the problem of land degradation, also offers profitable fruit production even in locations where the basic resource, soil, is limited.

# Threats of the case

- Due to the expansion of high-profit blueberry cultivation by this SLM technology (income around 60,000 USD/ha), according to the laws of market reactions, the prices of commercial substrates for blueberry cultivation could increase
- Education of farmers

# Ways to overcome Weaknesses and Threats

( in order to successfully implement this case on a much broader scale)

- Budgetary support through some of the agricultural policy (rural development) measures like support to investments in farms could be one of ways to overcome high initial investments
- Looking for the possibility of own production of a special substrate for growing blueberries (based on the use of a sawdust from the forest industry) is a way to overcome its possible increase due to the expected increase in demand
- Insufficient education of farmers requires the engagement of specialist agronomists (extension services)



# Thank you for your attention!

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