

The recovery of Tuscany's olive heritage: action to combat climate change for CO2 storage

Riferimenti

Tipo di progetto

Gruppo Operativo

Acronimo

CATChCO2-live

Tematica

Gestione aziendale

Information

Time frame

2019 - 2022

Durata

32 months

Partners (no.)

7

Regione

Toscana

Comparto

Olivicoltura

Localizzazione

ITI13 - Pistoia

ITI14 - Firenze

Costo totale

€342.945,00

Fonte di finanziamento principale

Programma di sviluppo rurale

Programma di sviluppo rurale

2014IT06RDRP010: Italy - Rural Development

Programme (Regional) - Toscana

Parole chiave

Climate and climate change

Landscape /land management

Farming practice

Sito web

<https://www.catchco2-live.it/>

Project status

completed



Objectives

Applying and validating a management model and innovative technical tools to recover and put back into production abandoned olive groves, enhancing at the same time the carbon uptake of the agroecosystem while respecting the environment. To encourage the sustainability process of the entire recovery process, the plan proposes

Activities

- Recovery of abandoned areas through the implementation and validation of a specific organizational and contractual model for owners
- An innovative protocol will be tested and applied to specifically evaluate the impacts of the application of precision agriculture to counteract the abandonment of cultivation
- Innovative agronomic techniques will be applied and transferred to increase the quality and the quantity of production as well as to improve soil fertility, organic substance maintenance and carbon stocks, increasing at the same time farmer's income with respect to business as usual techniques.
- Involvement of two pilot farms for the application and transfer of the methodologies

Context

The Montalbano area have undergone a strong abandonment in terms of surface (about 1,000 ha have passed to other land uses from 1954 to today) and density (approximately 4,800 ha have a planting density of less than 300 plants / ha). This situation derives from factors such as the location of

the olive groves in inaccessible and / or marginal areas, an unreasonable management of the crop, the high costs of the cultivation operations, the lack of adequate management tools. The progressive abandonment of olive growing will have as consequences not only the reduction from production but also the loss of the benefits deriving from the externalities related to this crop (eg less soil erosion, less fire risk, landscape protection, carbon storage, etc.).

Partenariato

Role	Azienda	Address	Telephone	E-mail
Leader	Cooperative Montalbano Olio e Vino Società Cooperativa Agricola	Via Giugnano, 135 51035 Lamporecchio PT Italy	0573.803200	nfo@cooperativemontalbano.it
Partner	DREAM Italia scrl	Via Garibaldi 3 52015 Pratovecchio Stia AR Italy	0575 529514	segreteria-ar@dream-italia.it
Partner	Università di Pisa - Dipartimento di Scienze Agrarie, Alimentari e Agroambientali	Via del Borghetto 80 56124 Pisa PI Italy	050 2216090	disaaa@agr.unipi.it
Partner	Università degli Studi di Firenze - Dipartimento di Scienze e Tecnologie Agrarie, Alimentari, Ambientali e Forestali (DAGRI)	Piazzale delle Cascine, 18 50144 Firenze FI Italy	055 2755700	direttore@dagri.unifi.it
Partner	CNR - Istituto per la BioEconomia IBE	Via Madonna del Piano, 10 50019 Sesto Fiorentino FI Italy	055 3033 711	
Partner	Azienda agricola Braderi Moreno	Via Orbignanese, 168 51035 Lamporecchio PT Italy	0573 82228	moreno50brad@gmail.com

Recupero del patrimonio olivicolo Toscano: azione di contrasto ai cambiamenti climatici per lo stoccaggio di CO2

3/4

<https://www.innovarurale.it/pei-agri/gruppi-operativi/bancadati-go-pei/recupero-del-patrimonio-olivicolo-toscano-azione-di>

Role	Azienda	Address	Telephone	E-mail
Partner	Azienda agricola Torrini Vasco	Via di Cammaggio, 8 50053 Empoli FI Italy	0571 80375	torrini.vasco@alice.it

Pratice abstract

Description

The organizational innovation provides that the recovery of the olive groves takes place through a synergistic use of the resources already present in the area (staff, equipment, widespread warehouse, cultivation operations paid to measure and not by the hour, etc.), without the need for new investments. This will determine a flexible management of the crop adapting to the different cultivation, climatic and market conditions with fixed, real and certain costs reduced to the minimum estimated in the GO setting-up phase. Companies will be able to take advantage of this opportunity to supplement their income and make the best use of their often oversized fleet. The same principle applies to the downstream production process since the cooperative has 6 crushing lines capable of processing around 3,000q of olives per day. The feasibility study carried out in the setting-up phase indicates that to reach a profit, the price of the oil must be higher than € 870 / q in realistic yield scenarios and in line with the settlement price paid by the Cooperative to its own conferring members

Description

The management innovation involves the combination of eco-compatible olive tree management protocols (canopy management, optimal time of harvest, organic fertilization, etc.) and techniques innovative, based precision agriculture tools (images remotely sensed by drone and satellite, traps machines for monitoring parasitic attacks, development of models for the production of maps of force) to optimize mechanization, predict the onset of diseases and pests, program the interventions in a targeted and localized way, reducing their environmental impact (in terms of mitigation as well of greenhouse gas emissions) and production costs, increasing incomes

Link utili

Titolo/Descrizione	Url	Tipologia
Sito web del progetto	https://www.catchco2-live.it/	Sito web
Manuale del progetto CATChCo2-live	https://www.catchco2-live.it/wp-content/uploads/2023/01/ManualeCatchCo2-live_co...	Materiali utili
Interfaccia web	http://www.drolive.unifi.it/simulazioni	Materiali utili

Titolo/Descrizione	Url	Tipologia
Relazione Finale	https://www.catchco2-live.it/wp-content/uploads/2023/01/Relazione-finale-CatchC...	Materiali utili