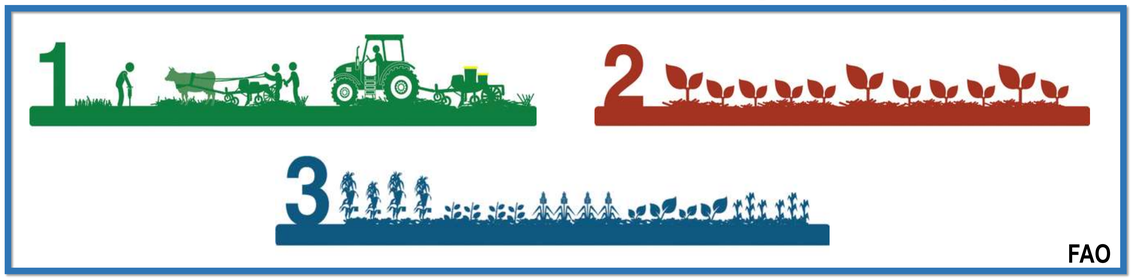
UNIVERSIDAD D CÓRDOBA

PROYECTOS INTERNACIONALES

VICERRECTORATE OF SCIENCE POLICY

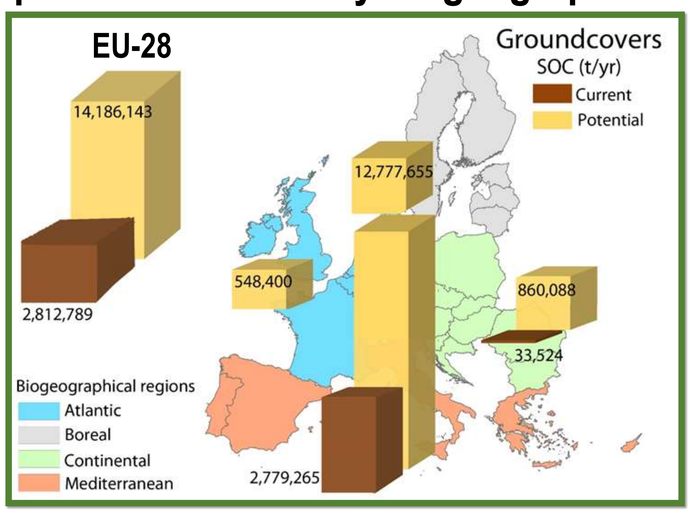
Three principles of Conservation Agriculture (CA)

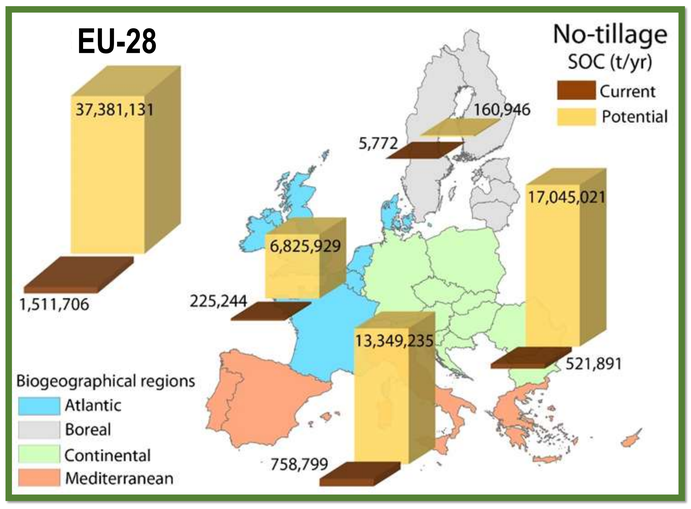


Barley in no-tillage

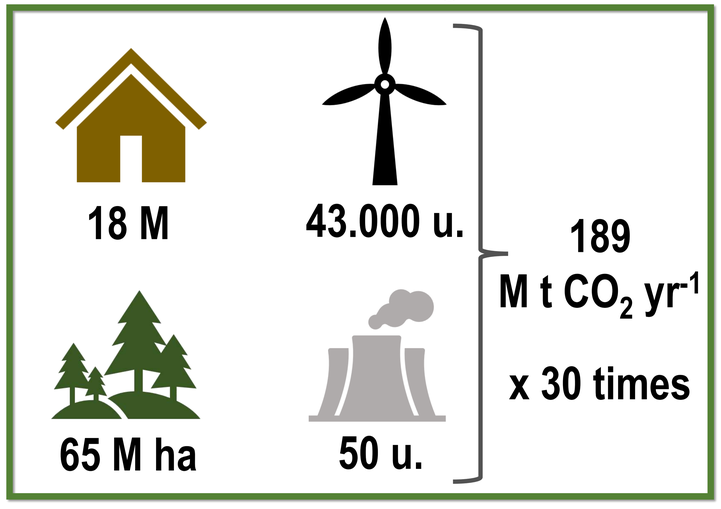
Groundcover in olive groves

Current soil organic carbon and its potential with CA by biogeographical

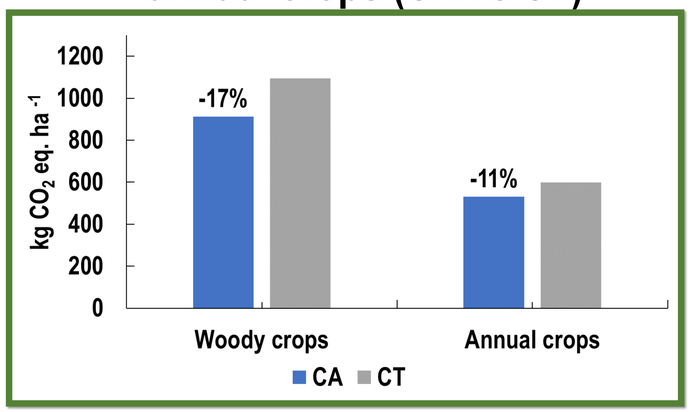




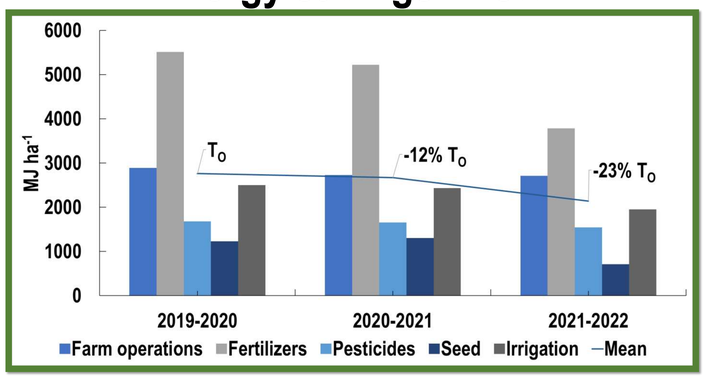
Climate change mitigation potential by Conservation Agriculture



CO_2 emissions for woody and annual crops (CA *vs* CT)



Energy savings in CA



LIFE Carbon Farming APP

INTERNATIONAL OLIVE GERMPLASM BANK OF CORDOBA

CONSERVATION OF THE OLIVE GENETIC RESOURCES, CHARACTERISATION AND STUDY OF EXISTING OLIVE VARIETIES IN THE WORLD

INTERNATIONAL OLIVE COUNCIL

OLIVE VARIETIES EXAMINATION CENTRE

TECHNICAL EXAMS FOR THE NEW OLIVE VARIETIES: PROTECTED AND COMMERCIAL VARIETIES

DUS
OLIVE TESTS
UPOV TG 99/4

CEVO
CENTRO DE EXAMEN DE VARIEDADES DE OLIVO

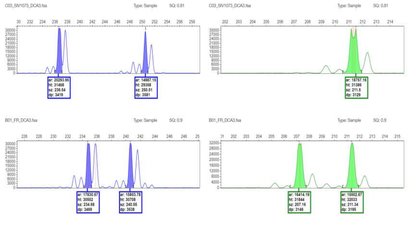
OEV Oficina Española de Variedades Vegetales
GOBIERNO DE ESPAÑA · MINISTERIO DE AGRICULTURA, PESCA Y ALIMENTACIÓN

CPVO
Community Plant Variety Office

PUBLIC ISOLATED REPOSITORY SPANISH COMMERCIAL VARIETIES
THOC PROJECT (INTERNATIONAL ISOLATED REPOSITORY)

PRODUCTION OF PREBASIC AND BASIC MATERIAL FOR CERTIFICATION
TRUE TO TYPE (AUTHENTIC)
HEALTHY (PATHOGENS FREE)

OLIVE VARIETIES IDENTIFICATION SERVICE



UNIQUE SERVICE IN THE WORLD
OLIVE VARIETAL IDENTIFICATION USING MOLECULAR AND MORPHOLOGICAL MARKERS

NEW OLIVE CULTIVARS OF THE BREEDING PROGRAM OF THE UNIVERSITY OF OF CORDOBA

UNIVERSIDAD Ð CÓRDOBA

PROYECTOS INTERNACIONALES

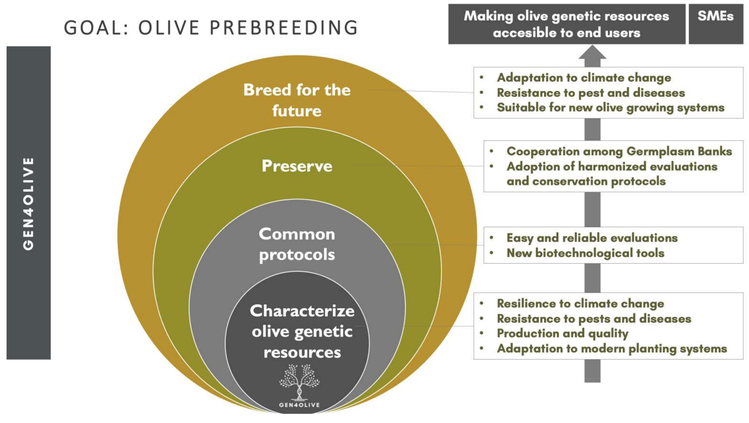
VICERRECTORATE OF SCIENCE POLICY

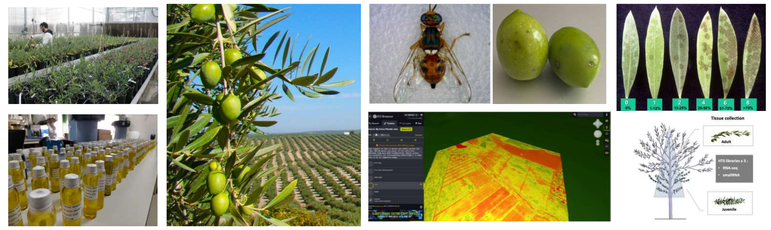
GEN4OLIVE CONSORTIUM

GEN4OLIVE

MOBILIZATION OF OLIVE GENRES THROUGH PRE-BREEDING ACTIVITIES ENSURING INFORMATION AVAILABILITY FOR END USERS

GOAL: OLIVE PREBREEDING





- Characterizing more than 500 cultivated and wild genotypes under common protocols in different environments
- Developing biotechnological and AI tools to accelerate olive breeding
- Predicting possible effects of climate change on olive to find solutions
- Making information easily available to breeders and end users
- Enhancing the participation of farmers, breeders and SMEs in olive breeding

Building the future of olive production

This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No. 101000427

UNIVERSIDAD DE CÓRDOBA

PROYECTOS INTERNACIONALES

VICERRECTORATE OF SCIENCE POLICY

EXPERIMENTAL FARM OF RABANALES

An Innovative Ecosystem of Sustainable & Digital Agriculture

UNIVERSIDAD Đ CÓRDOBA

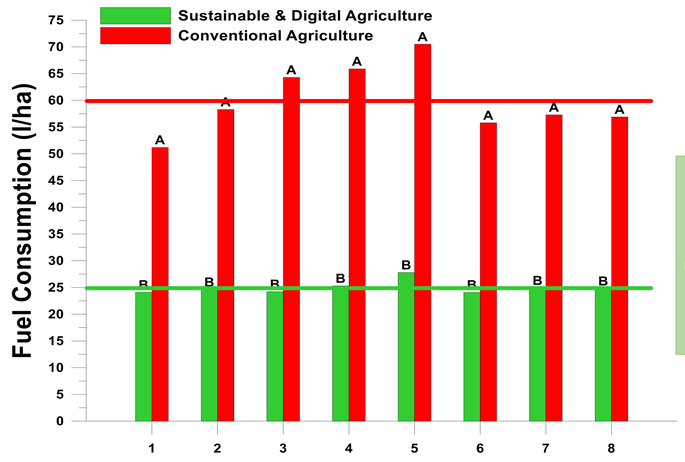
Experimental Farm of Rabanales// University of Cordoba

185 ha
dry and rainfed crops

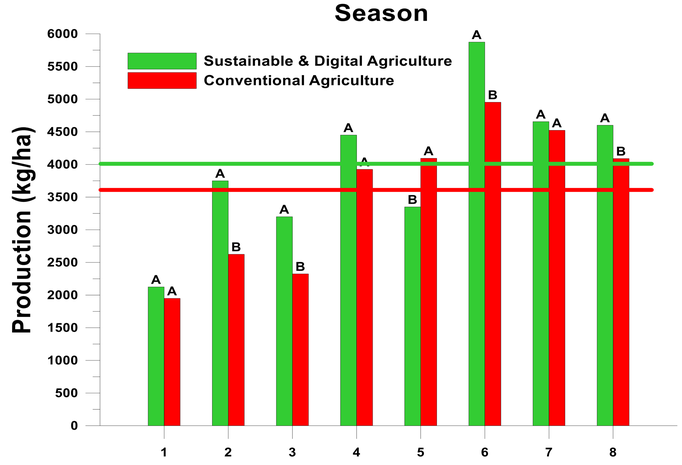
Crops
Olive / Pistachio / Cereal / Legumes / Canola / Sunflower / Maize

- 20 Research Groups Working in the Experimental Farm
- 7 International Projects
- 22 Multinational Companies and Associations Collaborating on the Experimental Farm
- More than 2.7 M € captured in the last 10 years in Scientific Equipment Infrastructure

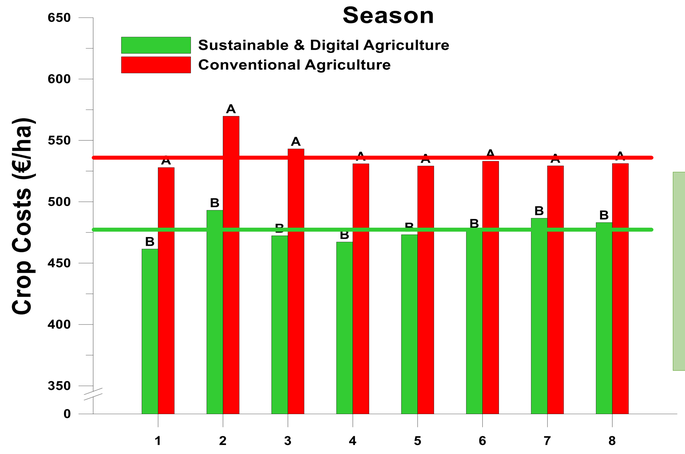
Our core is to implement and adapt new technology systems in a sustainable, digital and profitable agriculture



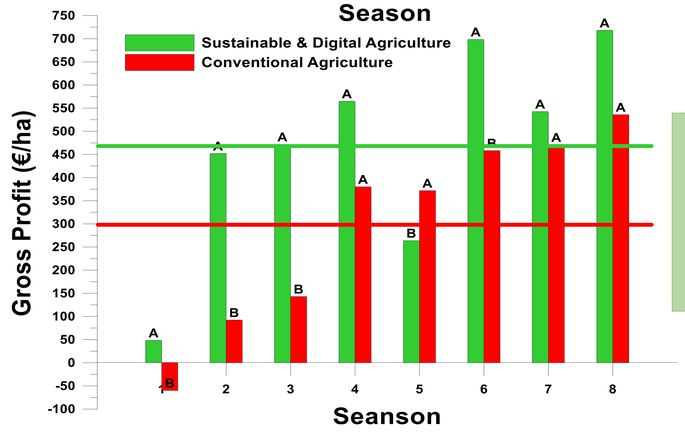
Average Reduction of Fuel Consumption 35 l/ha (58,3 %)



Average Increase of Cereal Production 440 kg/ha (11,0 %)



Average Reduction of Crop Costs 60 €/ha (11,1 %)



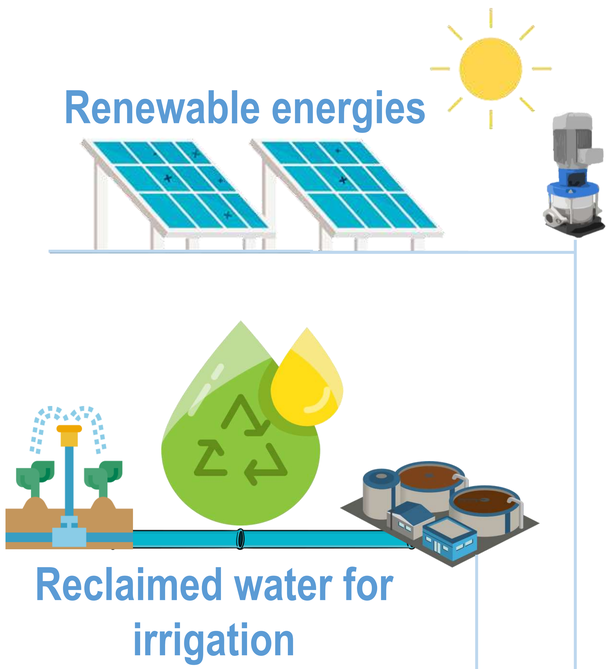
Average Reduction of Crop Gross Profit 171 €/ha (57,2 %)

UNIVERSIDAD Ð CÓRDOBA

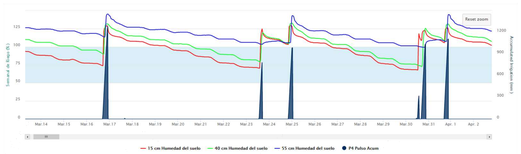
PROYECTOS INTERNACIONALES

VICERRECTORATE OF SCIENCE POLICY

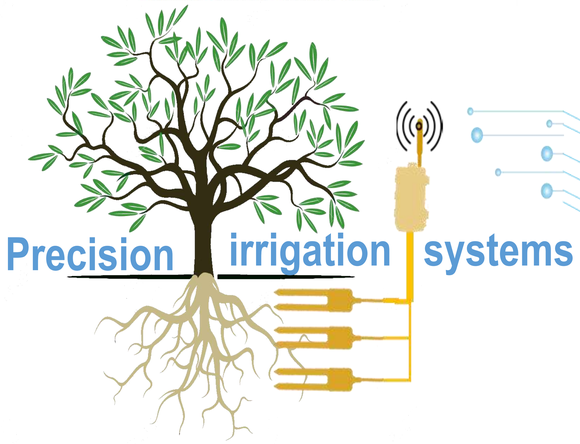
Digitization and smart irrigation water management



Digital Twins



Artificial intelligence



Applications of Remote Sensing in Agriculture

From REGIONAL to LOCAL scale

- Air quality
- Common Agricultural Policy
- Trends and Climate Response
- Crop variety and climate adaptation
- Weeds detection
- Food security

RGB
From Multispectral DATA to INFORMATION
Hypersepctral
Thermal
LiDAR