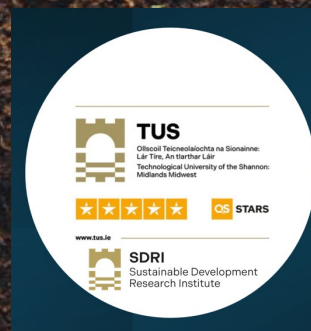




AGRETAIN

Regenerative Sustainable Food Chains
Through Market Gardening

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Co-funded by
the European Union

Sustainable Development Research Institute

- dedicated to achieve **social, economic and environmental changes** through applying its expertise in a **collaborative manner**. (extensive networks and connections with community, enterprise, industry and public sectors)
- To engage in research and project development activities in the fields of Sustainable Development and to align this activity with the UN SDGs
- funding from an array of EU programmes (Horizon, LIFE, Erasmus+, etc.) both as coordinators and as partners/co-beneficiaries.



➤ Post Graduates – SDRI Bursaries for Masters and PhD Research

- 40+ projects. Number of focus areas:

- | | |
|-----------------------------|-----------------------|
| ❖ Climate Action | ❖ Technology |
| ❖ Agriculture & Environment | ❖ Renewable Energy |
| ❖ Rural Development | ❖ Construction Skills |
| ❖ Social Enterprise | ❖ Embodied Carbon |
| ❖ Digitalization | ❖ Circular Economy |



Climate Action



Energy



Rural Development



Social Enterprise



Sustainable Development



Technology for Education



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Co-funded by the
Erasmus+ Programme
of the European Union



<https://www.agretain.eu/>

Regenerative Sustainable Food Chains through Market Gardening - Agretain

- €1.1m Erasmus Alliance for Education and Enterprise project on Regenerative Sustainable Food Chains through Market Gardening called Agretain.
- It has 10 partners from 5 countries
- TUS is coordinating and project managing this three-year project
- The project is targeted at market gardeners, farmers, neo farmers, farming enterprises, horticulturists, HEs, VETs etc.



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<https://www.agretain.eu/>



TUS





<https://youtu.be/DrR8Q8MmmFI?si=cpWqYp5iheLyO3R7>



AGRETAIN

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The main **aim** of AGRETAIN is to combine the efforts of universities and enterprises (VET providers, farmer consultants), research institutes and social actors to develop **new teaching methods and learning material** in the field of **market gardening** focusing to open up new learning opportunities for the embedding of more resilient, sustainable/ environmentally friendly, soil regenerative practices in small scale farming.

<https://www.agretain.eu/>



- **curriculum** for VET education in EQF level 5/NFQ6
- 15 Learning Units
- 3 training methods applied (face to face, e- learning, WBL)
- **e-learning platform** in 4 languages and gamified learning activities
- 165-220 learners/ students in piloting
- **Interactive map** - specific information for selected regions in terms of soil, water resources, humidity, temperature etc.
- 8 **Farm portraits** per partner country developed upon the selected regions specifics and/or regions with similar characteristics
- 5 **Market Gardening Hubs** established
- AGRETAIN website: <https://www.agretain.eu/>



All Farmers showed significant lack of confidence in **Analyzing Digital Data**, whilst all target groups highlighted the importance of **Green Skills, Entrepreneurial Skills and Transversal Skills**

Finally, developing a course in Market Gardening is considered critical by...

82%

89.8%

13 categories of Skills were Identified

- Soil Management**
First in priority by **72%** Farmers and **69%** Farm Consultants and Policy Makers
- Crop Management**
Was found to be critical by **66.3%** Farmers and **74.2%** Farm Consultants and Policy Makers
- Grow Horticulture crops**
64% Farm Consultants and Policy Makers highlighted the need of these skills
- Managing Sustainable Food Systems**
Showcased by **41%** Farmers and **47.4%** Farm Consultants and Policy Makers
- Developing alternative Business Models**
Highlighted by **60.1%** Farmers and **62.9%** Farm Consultants and Policy Makers
- Project Management**
55% Farmers expressed lack of confidence in these skills whilst **82.5%** Farm Consultants and Policy Makers consider them of major importance
- Funding and Budgeting**
59.5% Farmers showed lack of confidence while **78.3%** Farm Consultants and Policy Makers highlighted the need
- Conducting Marketing Research**
62.3% Farmers showed lack of confidence and **60%** Farm Consultants and Policy Makers stressed out this need
- Digital Marketing and e-Commerce**
53.6% Farmers showed lack of confidence and highlighted by **70.8%** Farm Consultants and Policy Makers

A Training Needs Analysis

275 Respondents from **5** Countries

Country	Respondents
Italy	50
France	48
Germany	60
Denmark	53
Greece	59

Target Group	Count
Farmers/ Market Gardeners/Volunteers/ Neo Farmers	178
Farm Consultants Agronomists	52
Policy Makers	45

New Curriculum



A) INTRODUCTION

- Market Gardening as alternative to conventional business models
- Introduction to business models
- Fundraising
- Transversal/ green skills

B) AGRICULTURE

- Soil Management
- Crop production
- Sustainable Market Gardening System Management

C) BUSINESS

- Managing your Market Gardening project
- Budgeting
- Entrepreneurship
- Digital skills
- Customer and relations management

A) Introduction to Market Gardening



An introduction to Market Gardening as a sustainable and profitable alternative business model within the agricultural sector. Designed to equip learners with foundational knowledge and skills, this Module covers key concepts, practices, and the business potential of small-scale, intensive crop production. By the end of the module, learners will understand the principles of Market Gardening, explore methods for establishing and managing a Market Garden, and evaluate its potential as a viable business opportunity.

[View Learning Units](#)

B) Agriculture



This learning unit provides a comprehensive understanding of soil health, including its importance, functions, types, and nutrient cycles. It demonstrates methods to assess soil using practical tools like spade tests, chemical analysis, and microbial analytics, and applies sustainable management practices such as crop rotation, cover cropping, agroforestry, and low-till methods. Learners will gain practical skills in composting, fertilizer use, and evaluating tools and machinery. It enables learners to design and implement soil management plans that enhance soil health, promote sustainability, and integrate innovative techniques to balance productivity and ecological stewardship.

[View Learning Units](#)

C) Business



This Module introduces Market Gardeners to Project Management principles, tools and techniques, covering concepts such as effective planning, organisation, and management of Market Gardening projects by setting clear objectives, coordinating resources, monitoring progress, managing risks and ensuring timely completion. It suggests alternative tools and techniques that may be used to allow for continuous growth planning through the incorporation of evaluation processes in the Market Gardening Plans.

[View Learning Units](#)

🌱 LU1 - Market Gardening as an Alternative Business Model



This Introduction Learning Unit offers a broad overview of key concepts and practices in Market Gardening, designed to spark your curiosity and lay the groundwork for deeper exploration in upcoming modules and learning units.

You'll gain insight into:

Business Fundamentals: Learn the basics of business planning, market research, and branding tailored to small-scale agriculture.

Sustainable Agriculture: Discover essential practices for soil health, pest and disease management, and effective water use.

Customer & Community Engagement: Explore consumer trends, the local food movement, and strategies for building strong customer relationships and community loyalty.

LU1 >>

🌱 LU2a - Introduction to Business Models



Welcome to Introduction to Business Models for sustainable market gardening. This learning unit provides a comprehensive framework for designing, evaluating, and implementing business models that integrate ecological, social, and economic sustainability. Unlike conventional maximization, sustainable market gardening requires business model dimensions. This unit will guide you through the essential components of initial planning through implementation and scaling.

LU2a >>

🌱 LU3 - Funding Your Market Gardening Business



This learning unit is designed to help market gardeners, whether start-up or established enterprises, to identify various income sources. This includes government grant aid or other ways of raising funds for your market gardening business. The module also looks at different forms of fundraising that can increase your income streams.

LU3 >>

🌱 LU4 - Green and Traversal Skills



This Learning Unit will introduce you to sustainability principles and values, covering concepts as well like circular economy and bioeconomy. It explores global and regional frameworks such as the UN's Sustainable Development Goals and the European Green Deal, focusing on nature-friendly practices. You will be able also to develop systems thinking skills and key competencies in resilience and adaptability so as to navigate effectively the evolving challenges in sustainable agriculture.

LU4 >>

LU1 - Market Gardening as an Alternative Business Model

All Courses > Agretain > A) Introduction to Market Gardening > LU1 - Market Gardening as an Alternative Business Model



Overall progress % 23

 Market Gardening as an Alternative Business Model	 Work Based Learning (WBL) Activity	 Face to Face Learning	 LU1 Quiz
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Question **3**

Not yet answered

Marked out of 11.00

🚩 Flag question

⚙ Edit question

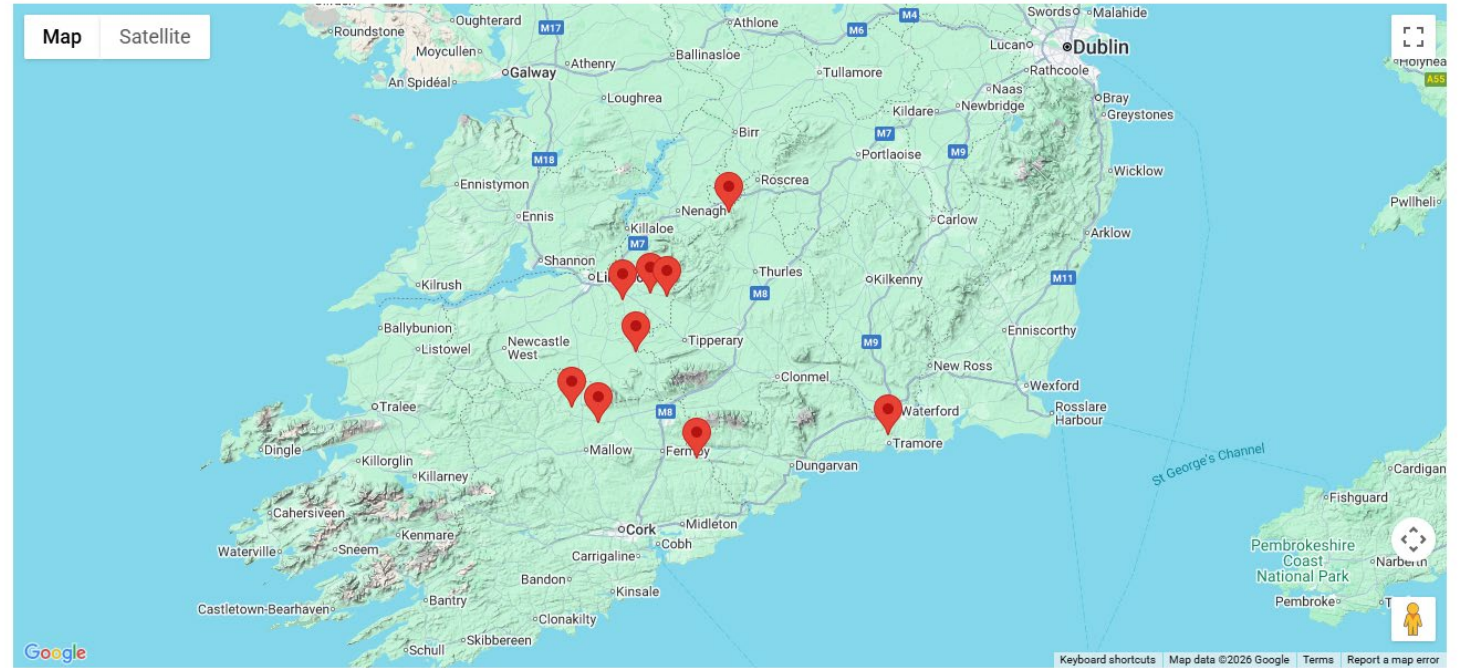
Branding has no impact on customer loyalty in market gardening.

Select one:

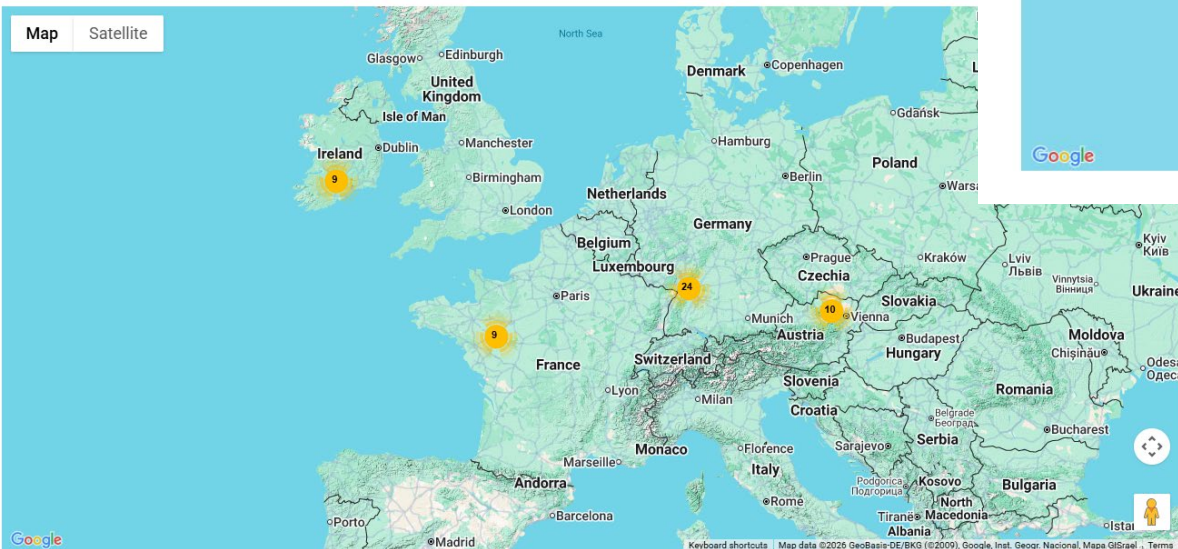
- ☐ True
- ☐ False

<https://www.agretain.eu/map/>

Interactive Map



Interactive Map



agretain.eu/farms/farm-survey-michael-poshea/

**Want to sign up to be
added to the
interactive map?
Contact
marie.taylor@tus.ie for
farm portrait form to
fill out**

Farm Overview

Country
Ireland

Region
Munster

Year Established
2022

Area Under Market Gardening
< 0.25 ha

Dominant Soil Type
Sandy

Soil Constraints
Lack of organic matter, compacted

Crop Production

Planting Week
Week 6

Production Area Share
75% open / 25% protected

Crop Rotation System
✓ Yes

Main Vegetable Species Cultivated

Kale (curly, black, etc.), Lettuce (butterhead, romaine, loose-leaf), Mizuna, Mustard greens, Spinach, Wild rocket (*Diplotaxis tenuifolia*), Beetroot (red, chioggia, golden), Carrot, Garlic, Leek, Onion (yellow, red, white), Parsnip, Potato (early, maincrop), Cucumber (outdoor and greenhouse), Pumpkin (*Cucurbita maxima*, *moschata*), Summer squash / Zucchini, Tomato (various types), Celery

Soil Management & Practices

Tillage Intensity
3/5 (1 = notill, 5 = intensive)

Use Compost
Yes, own production

Use Mulch
Yes, purchased

Main Irrigation Source
Municipal water

Market Gardening Hub for Ireland

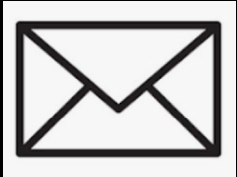
- To provide information and support regarding Market Gardening management and production decisions that enable market gardening practices.





SDRI

Sustainable Development
Research Institute



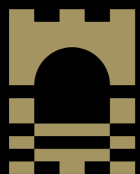
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<https://www.linkedin.com/company/tus-development-unit>

<https://www.agretain.eu/>



TUS