



KT Masters in Agricultural Innovation Support (MAIS) Project Summary 2025

1. Project Title

Evaluate the Effectiveness of Education in Enhancing Ecosystem Services in Ireland's Uplands

2. Project Background

This project proposes to evaluate the effectiveness of the Uplands Farmers Pilot course that commenced in Connemara, Co Galway, in November 2024. The objective of the course is to improve farmers understanding of the range of ecosystem services that uplands can provide and encourage the uptake of practices to improve delivery of these ecosystem services. The pilot course was developed by Teagasc with the support of Wild Atlantic Nature LIFE IP.

This project will focus on assessing the courses effectiveness in driving enhanced sustainable farming practices among participants. The evaluation will employ a mixed-methods approach, combining quantitative surveys and qualitative interviews to gather comprehensive feedback from farmers who have completed the course. Key evaluation metrics will include changes in farming practices, participants' understanding of sustainable techniques, and the perceived impact on economic and environmental outcomes. We will track relevant indicators such as biodiversity improvements, water quality, and carbon storage using available data on relevant environmental outcomes. The drivers of change can be complex and often outside the control of the farmer for example, variables such as weather conditions and price can have a significant impact on environmental outcomes. The use of multiple data sources provides strong basis for estimating the impact of the module on environmental outcomes.

Findings will be disseminated through farmer workshops, research reports, and advisor presentations, ensuring that the insights gained can inform future iterations of the course and support broader efforts in sustainable upland farming. Ultimately, the project will provide actionable recommendations that enhance the programs' impact and benefit the upland environment and community.

3. Project Aims and Objectives

Overall, this project aims to evaluate the role of education in upland farming by assessing the development and impact of the pilot upland module on sustainable management practices on hill farms.

The objectives of this project are to:

- 1. Examine the effectiveness of the Upland Farmers Pilot Course in enhancing farmers' understanding of the unique challenges associated with upland farming and their capacity to deliver various ecosystem services
- 2. Investigate how this understanding translates into the adoption of practice changes that address these challenges
- 3. Identify barriers to adopting appropriate practice changes in upland areas
- 4. Provide actionable recommendations to facilitate improved management of upland ecosystems.

4. Suggestions for Methodology

The proposed study will utilise a mixed methods approach to assess the effectiveness of the upland management module.

- 1. Initially, a survey will be administered to participants immediately after completing the course to evaluate their understanding of sustainable management practices and the challenges of upland farming.
- 2. A follow-up survey will be conducted six months later to assess the adoption of these practices and to identify reasons for any non-action. This two-phase approach allows for a comprehensive understanding of both immediate learning outcomes and longer-term behavioural changes. The survey design will be informed using pedagogical literature specifically looking at evaluation of learning concepts and programme design.
- 3. Additionally, qualitative interviews will be conducted to gather deeper insights into the barriers faced by farmers in implementing practice changes. This methodology is both appropriate and innovative, as it combines quantitative and qualitative data to provide a holistic view of the programs' impact on sustainable upland farming.