

LOCHABER MONITOR FARM

Grazing in Woodland to Support Farming and Biodiversity in Argyll and Lochaber

THE CHALLENGE

In the first year that Strone Farm was the Monitor farm an Environmental Audit was drawn up. This audit highlighted the importance to the environment of the Ancient woodland that occurs within the business. The business looked to actively manage the woodlands to support the existing natural assets of the ground in a sustainable way and to support their farm business.

Argyll and Lochaber have some of the best quality native woodland in Scotland supporting an extremely high biodiversity value which features in many designated sites. Native woodland is also a key objective in the Scottish Forestry Strategy with a specific intention of enhancing the contribution of forestry to climate change mitigation. Native woodland is important on a livestock farm for shelter from weather during the whole year and can provide grazing in an extensive system.

Can we sustainably manage native woodland in Argyll and Lochaber to produce mutual benefits to farming, biodiversity and carbon sequestration?



Native Woodland Areas on Strone Farm

WHAT WE DID ON FARM



Marsh Fritillary Butterfly occurring in wet areas around the woodland

As part of the Lochaber Monitor Farm environmental audit we looked at all the native woodland and selected an area with continued grazing and high biodiversity. In this case it was around 109ha of an existing native woodland which has a SSSI designation on it.

To help us bring together the farming and biodiversity value we started a grant aid application for Grazing in Woodland from Forestry and Land Scotland and discussed our plans with SNH.

THEME REPORT



The first step was to survey the selected woodland and split it into habitat types before using the Woodland Grazing Toolbox to write a grazing plan. Toolbox can be found here <https://forestry.gov.scot/woodland-grazing-toolbox>

The toolbox gives a step by step approach to writing your woodland grazing plan. Simply it looks at the forage production of different habitats, using supplied tables, and by applying that to your own piece of ground enables you to come up with a figure to represent the forage available to grazing animals.



Chequered Skipper occurs in the open spaces around the woodland

In a woodland it is best to work with an estimate of removing between 10% and 20% of forage each year to maintain open areas in the woodland but also allow some regeneration. This figure will depend on type of stock chosen to graze as well as general site specific factors and your own aims but will give a starting point for how many livestock can be sustainably grazed.

Next stage is to work out, using provided tables, how much forage each of your animals consumes and from here play with grazing dates and numbers until you come up with a satisfactory number of cattle or sheep that can be grazed within the woodland area in a sustainably way. See table 1 below.

Calculation of stocking density for		Woodland A	
Box 1: Ground layer vegetation productivity			
Habitat/Woodland type	A	B	C (=A x B)
	Area (ha)	DM production ha/yr	DM production /yr
		(tonnes ha ⁻¹ year ⁻¹)	(tonnes year ⁻¹)
Mixed Upland Ashwood	80	0.5	40
Wet Woodland	8	0.1	0.8
Wet Heath	21	0.3	6.3
Total	109	0.9	47.1
D (=1,000 x C) DM production in kg year⁻¹			47,100
Box 2: Grazing regime options			

THEME REPORT



	1	2	3
Type of grazing animal to be used	Aberdeen Angus	Aberdeen Angus	
E Target utilisation rate (%)	10	20	
F (=ExD) DM to be removed by herbivores (kg year⁻¹)	4,710	9,420	0
G DM intake per animal (kg day⁻¹)	8.8	8.8	
H = (F/G) Number of animal grazing days required per year	535	1070	
I Proportion of the year during which grazing will take place	0.46	0.46	
J (=H/(365xI)) Number of animals needed	3.2	6.4	
Preferred grazing regime	Aberdeen Angus cattle removing 10% of the vegetation and Grazing for 5.5 months of the year between 15th May to 31st October shows a requirement of 3.2 cows. Intend to put on 4 as a starter and change numbers up if necessary dependent on monitoring results.		

The above table looks complex but the guide provides a step by step approach and gives you an opportunity to try different grazing regimes on paper encouraging thought about the best management of the area in question.

RESULTS

This project is aimed at

- Supporting the woodland by allowing some regeneration
- Supporting the biodiversity in the open spaces by keeping them open by cattle grazing
- Supporting the farm by allowing continued grazing and by applying for the Woodland Grazing grant from Forest and land Scotland at current rates of £100/ha/yr



THEME REPORT



The project is achieving

- The Native woodland is important for carbon sequestration and is being maintained.
- The open spaces are important for Black Grouse and for Marsh Fritillary and Chequered Skipper butterfly and these are being maintained by the cattle grazing
- The livestock are being maintained in this wood for the benefit of the farm and to assist in the maintenance of these livestock there is also a grant aid of £100/ha/yr for the duration of the scheme which is 5 years.

For more information on forestry grant aid including Grazing in Woodlands:

<https://www.ruralpayments.org/publicsite/futures/topics/all-schemes/forestry-grant-scheme>

WHAT HAS CHANGED ON FARM

The farm is making best use of its assets and actively and sustainably managing the woodland.

The farm is maintaining the biodiversity which is an important asset for the future

The farm is working with SNH to support the SSSI.

The farm is looking to the future and considering introducing a small herd of native cattle to integrate with the existing cattle business.

The farm could look at other areas of native woodland areas and consider expanding the scheme into these extensive areas.



FACILITATOR CONTACT DETAILS

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