

Case Study on Fridays Farm – planting trees to encourage ranging behaviour in laying hens

Introduction

Free range eggs represent over 50% of the egg sales in the UK, putting Great Britain in a unique spot when it comes to egg production. Consumer demand for better animal welfare continues to build year on year, so investing in free range/organic systems with the highest welfare potential represents the most future-proofed investment. A good range is a key element of these systems. This case study aims to demonstrate best practice in providing a good range that stimulates hens to forage outside during daytime.

Ranging stimulates meaningful behaviours

Ranging enhances the opportunity for birds to express their full behavioural repertoire and ensures the highest welfare potential in a system. In natural conditions hens spend 50 to 90% of their time foraging, which involves searching and scratching at the ground or litter for potential food items (seeds, earthworms, flying insects, grit), followed by investigation and selection of food items by pecking. Ranging behaviour of birds (i.e. the extent to which they utilise the outdoor area) is affected by time of day, age, feeding system, weather conditions, previous experience, genetic strain, and importantly the quality of the outdoor environment provided.

Fridays Ltd

A third generation family business based in the South East, Fridays has been farming for over fifty years. Today Fridays supplies eggs to supermarkets and foodservice companies across the UK. Free range egg production has been an important part of the company's activities from the dawn of modern free range farming almost forty years ago. Fridays has developed some of the most modern farms in Europe, with ambitions to expand further. The most recent investment focussed on Combwell Farm.



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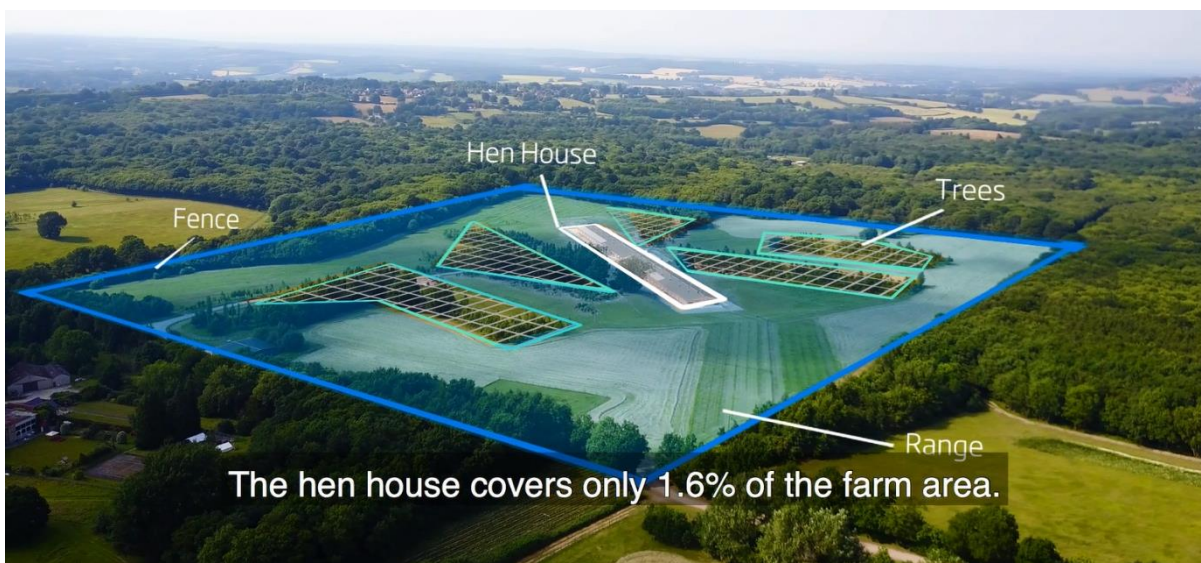
Combwell Free Range Farm

In the heart of Kent lies a farm dedicated to the needs of the resident free range hens. The farm is at the end of a five year redesign that has seen a woodland area of 34,000 trees established covering 45 hectares. Fridays Ltd wanted to create an active environment for their hens that would complement the three new hen houses.

The lineage of the modern day hen can be traced back to ancient jungle fowl. Foraging and roosting in a woodland habitats came naturally to these birds and they thrived in the natural shelter of the tree canopy. Today the hens at Combwell Free Range farm enjoy the habitat the new trees offer, protecting them from predatory birds and creating an environment to explore. But the trees have a very real health benefit to the hens too. By encouraging the hens out of the houses and prompting them to explore, the birds are better exercised and less stressed.

The Range

- Size: 225 acres
- Furthest distance from the house: 350m
- % of coverage by trees: 40%
- Estimated % of hens that range based on daily visual assessments: 80%



Partnership with the Farming and Wildlife Advisory Group

The farm is now teeming with wildlife, boosting biodiversity in the local area. A tailored planting plan for the range specified local varieties (Ash, Silver Birch and Hornbeam) along with faster growing trees (Poplar and Italian Alder) that establish quickly to create cover for the hens within two to three years. This woodland hosts a number of wild birds, small mammals and insects, supporting what has been designated a [Site of Special Scientific Interest](#). Importantly, the area is protected to conserve *Atrichum angustatum*, a moss that is rated rare in the UK.

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Maintaining the range is essential. Pebble beds surround the house to help clean the hens' claws as they return for shelter and feed. To maintain good foraging conditions around the house, grass protection mesh is used to protect the roots and encourage regrowth.



Training the birds

Pullet rearing is essential for the future laying hens to learn how to navigate the modern free range system. Fridays uses step-up and multitier rearing systems to prepare them to use perches in their new home.

The pullets are transported to the farm at around 16 weeks of age, where they will stay inside for a maximum of 4 weeks to get used to the new shed, before starting to explore and get to know the range.

When training the hens to come back to the house, it is important to condition their behaviour as predators and weather stressors are still night time risks. In order to do so, feeders are used to encourage the hens back into the house at the end of the day. Shrubs and lower tree branches are removed to reduce the young hens' tendency to nest out on the range. The hens then establish a routine of roosting in the house through the night before laying eggs early morning followed by the pop holes opening out onto the range.

With the eggs laid daily in the house, the farmers can guarantee their freshness and collect them with ease via the automated packing systems.



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A carbon neutral future

Building the three new hen houses from scratch meant new technologies could be embraced, and a real focus on minimising the carbon footprint of each egg to leave the farm. All three hen houses are clad with solar panels to help power the systems that supports the hens. On average these cover 33% of the daytime demand.

This farming model uses larger sheds with an increased number of hens (around 64 000), which although it may mean a bigger scale than traditional, does bring sustainability advantages such as:

- More potential to be commercially viable and truly replace caged systems in the UK market in a competitive way.
- Fewer trucks and emissions from transport – only one collection point for a larger number of eggs.
- Optimization of land, with fewer access roads and loading zones.
- More efficient management of manure coming out of the house – easier to collect and automatize. Also it is produced in a significant scale to be used as fertiliser by local farmers.

The two finished products are collected seamlessly; eggs are conveyed out of the house to be packaged and sold, whereas the muck is removed frequently on a belt to be used as fertiliser by local farmers! All undamaged eggs are printed with a farm ID code to ensure traceability all the way to the consumer.

Planning permissions

In order to move animals to higher animal welfare systems such as free range egg production, new farms will need to be put in place. One of the first steps of the process is planning applications. There are still technical and community challenges to overcome to establish future free range production. Demonstrating the benefits of new free range sites to local communities and NGOs will be essential. Communicating the employment opportunities will also play an important role. Happy farmers make happy hens!



Fridays for example, has commissioned a short video to illustrate how new farms are designed to have low impact on local residents and the environment:

<https://www.youtube.com/watch?v=PVMpaGoQoF0>

The future of farming needs to be more sustainable and allow animals to express natural behaviour, providing them with opportunities to confidently use the range as well as supporting the local wildlife and biodiversity.