

Magnesian Limestone Grassland Establishment and Management in face of adversity Church Fields, Boston Spa, Leeds, West Yorkshire

Brooks Ecological Estates and Taylor Wimpey and Boston Spa Parish Council

BIG Biodiversity Challenge Award category: Maintenance & Management Award

Project overview

A planning condition required creation of limestone grassland on a specific part of this site which had suitable underlying Magnesian Limestone geology. In 2014 large volumes of topsoil were placed across the grassland and discussion followed about creating a more fertile, pollinator grassland to avoid removing these soil volumes. Boston Spa Parish Council and Leeds City Council were involved to ensure an objective of low fertility soil substrate was met, by insisting on removal of inappropriate topsoils in 2015, under strict supervision of the developer's ecologist Brooks Ecological. A different contractor was then used to sow the wildflower area which resulted in weed infestation and a stony substrate that could lead to ongoing management problems. At the same time residents were moving into new houses and instead of having views of an attractive wildflower meadow, they would have to endure unsightly views of bare soils during the establishment period – which could result in the scheme failing because local people would be unable to appreciate the value of the future grassland. It was only through the continued support of Taylor Wimpey in re-employing specialist ecologists from Brooks Ecological that the biodiversity fortunes of this site were turned around, not once but twice, in way that brought the local community back on board.

What were the biodiversity conditions on site, prior to the enhancement?

Prior to development the site was an intensively farmed arable field right up to the edge of the main River Wharfe. Biodiversity value was low.

Were there any specific reasons that led to this project?

A planning condition required the creation of 0.75ha. of species-rich limestone grassland together with ground preparation, methods of vegetation establishment, aftercare, management and monitoring for the first 5 years following implementation.



Grassland May 2016 prior to Brooks Ecological taking on establishment and maintenance. Note stones & bare patches.

What were the biodiversity measures taken?

Brooks Ecological were involved in the planning application (consented under appeal in 2012) by developing biodiversity enhancement proposals and a methodology for Magnesian Limestone grassland as part of a planning condition. In 2015 they dealt successfully with an issue of wrongly placed topsoil volumes being removed to re-expose the sub-soil geology. However the developer appointed a different contractor to carry out the ground preparation and seeding in 2016. The result was an appropriate seed mix being used but a large number of stones being left on the surface. Local residents complained about the potential for stones being thrown near buildings, Other issues were the presence of bare soils and weeds such as Creeping Thistle.

Between Summer of 2016 to Summer 2017 Brooks Ecological Estates were re-appointed by Taylor Wimpey to establish and maintain the correct grassland sward to resolve conflicts with local residents. As the Leeds City Council Ecologist, I have been very impressed with the thoroughness of Brooks Ecological in carrying out the appropriate soil quality testing, sub-soil depth measurements, response to a request to take Bee Orchids from one other site (to be lost) to help provide interest on this site, seed transfer of Field Garlic from elsewhere on this site, provision of an interpretation panel (not required under planning condition), meeting with Boston Spa Parish Council (who will take on long-term management of the site) to answer their questions in a professional and helpful manner, removal of all stones and weeds from the site, and provide regular written reports to myself with photographic evidence.



Bee Orchid plants with soils containing mycorrhizal fungi from donor site to help provide visual interest for local residents.

This project focusses on the last 12 month period in turning the site from one which could have been problematic and the Local BAP (and UK BAP) Habitat of Magnesian Limestone Grassland not being created and managed - to one whereby in June 2017 the correct maintenance and management has commenced by a specialist ecological maintenance company called Brooks Ecological Estates – a sister company of Brooks Ecological that was set up for specialist sites such as this one whereby a developer's landscape maintenance company do not possess the relevant specialist skills.

How would you best describe the project?

Enhancement

Further information

Many hurdles have been overcome during the construction phase including the timing of residents moving in before an attractive sward emerged. This was overcome by the developer appointing the right ecological contractor and the sward established quickly by May 2017. Brooks Ecological Estates and have been commissioned by Taylor Wimpey for the 5 year maintenance of the grassland area before handing over management to Boston Spa Parish Council. A positive relationship between Brooks Ecological, local residents and the Parish Council has been established which gives assurance that this project will succeed and contribute significantly to a biodiversity locally.

This project is a good example of why a developer should appoint a thorough and reliable ecological company not just from pre-planning to completion, but also afterwards for maintenance of specialist biodiversity habitats which are directly overlooked by new residents.



Magnesian Limestone Grassland in May 2017 with good sward establishment

What was your personal motivation for carrying out the enhancement?

Achieving the original planning condition but also wanting new residents to benefit and appreciate from biodiversity right on their doorstep.