

Anglian Water Services

Rutland Water Habitat Creation

Environmental Statement

Non-technical Summary

Introduction

Rutland Water reservoir was constructed by Anglian Water Services (AWS), to store water pumped from the Rivers Welland and Nene before treatment at Wing Water Treatment Works and delivery to local homes and industries. AWS will soon need to find additional water to meet the demands of the region for supplies to new homes. After examining a number of options, AWS concluded that the additional supply would need to be met by increasing the capacity of Wing Water Treatment Works. This is likely to cause the water levels in the reservoir to be drawn down more often and for longer periods.

Since its construction, Rutland Water has become popular for a variety of recreational purposes and is designated as an internationally important nature conservation site, particularly for the large numbers of important species of water birds. When the water levels of the reservoir are drawn down, the amount of habitat for the water birds decreases, which could have an effect on their numbers. The strict legislation governing international nature conservation sites states that the bird numbers must not be allowed to decrease, so AWS are required to create additional water and wetland habitat to support all birds that might be displaced when water levels in the reservoir are low.

Proposed Habitat Creation

Data on the densities of birds using the existing three lagoons near Egleton have been used to calculate the additional amount of habitat required as 96.3 ha of water and wetland. AWS propose to achieve this in two ways:

- dam up the water in Fishpond Arm (11 ha) and in Manton Bay (22 ha), to prevent them drying out when the rest of the reservoir is drawn down; and

- create 55.3 ha of new shallow lagoons and 8 ha of improved wetland areas on agricultural land off the western end of the reservoir, to the north and south of Egleton village.

Water would be piped into the new lagoons and also into the three existing lagoons to maintain water levels, even during drought periods. It is also important that the birds are not disturbed by the sight or sound of human activity, so the lagoons would be screened by hedges, trees and banks. The dams in Fishponds Arm and Manton Bay would be under water when the reservoir is full and would become visible only when the water level is drawn down to 85% full.

Construction would take place over 6 to 8 months (spring and summer) in each of three years:

2007 – create new lagoons north of Egleton

2008 – build dam on Fishponds Arm

2009 – create new lagoons south of Egleton and build dam in Manton Bay.

The Planning Process

The creation of the new bird lagoons requires planning permission from Rutland County Council (RCC) and has been the subject of wide consultation with statutory consultees (especially English Nature) and the public. An Environmental Statement, accompanied by a series of supporting documents has been produced to assess and describe a range of environmental effects resulting from construction and operation of the new habitat. This non-technical summary gives a brief description of the likely environmental effects, after all mitigation measures have been incorporated.

Summary of Environmental Effects

Ecology – there would be temporary, minor adverse effects on all habitats and species during the construction period, particularly when the new lagoons are being created on land. However, once the lagoons are operational, they would improve the biodiversity of the area and benefit all species, with the possible exception of badgers, which could lose some of their foraging grounds.

Local Community – To minimise disruption to local residents during construction, the new lagoons have been designed so that no soil would need to be brought into or removed from site. Traffic would move directly from the A606 or A6003 onto specially created tracks to avoid disruption to

the villages and materials for construction of the dam in Manton Bay would be brought in by boat across the reservoir. However, in combination with the construction of Oakham Bypass, which is programmed for the same period, there would be considerable noise and disruption to the residents of Egleton. Once the lagoons are operational, they would add to the local interest of the area, particularly for birdwatchers.

Land Use – The construction of 55.3 ha of new lagoons on agricultural land around Egleton would result in the permanent loss of arable and grazing land.

Recreation and tourism – Altogether, construction would cause disturbance to recreational users for three consecutive summers. Construction would affect the peace and tranquillity of the area and would restrict fishing activities on the reservoir in two of the three years of activity. During the year when materials are transported by barge to Manton Bay, there would be disturbance to users of the car park by the Butterfly Farm and minor restrictions to sailing and windsurfing on the reservoir. Once operational, fishing would not be permitted in the impounded areas in Fishponds Arm or Manton Bay, because the submerged dam would cause a safety hazard to boats. There would be no other effects on the trout fishery in the main reservoir. On land, there would be temporary diversions and disturbance to footpaths and the cycleway, but once construction is complete, there would be attractive new additions to the walking and cycling routes and improved interest for bird watchers.

Landscape and Visual Characteristics – During construction, there would be considerable adverse effects on the views in the western end of the reservoir. Once operational, the two dams in Fishponds Arm and Manton Bay would not be visible when the reservoir was full. When the water levels are reduced to less than 85% full, the structure of the dam would be visible from the reservoir side, but views from the west would be of open water, rather than the dry areas that appear currently. The new lagoons to be constructed on land would be contoured to provide the best fit possible with the appearance of the surrounding countryside and, once the vegetation was established, they would be largely attractive additions to the views of the area.

Surface Water

The principal water quality issue in Rutland Water is that of nutrient enrichment, or eutrophication and the risk of algal blooms. The new lagoons themselves would have the following levels of plant nutrients: Lagoon A- medium to high; Lagoon B - high to very high;

Lagoon Complex C - low to medium; and Lagoon D - high. These high levels of nutrients in the new lagoons would allow algal populations to flourish and cause localised increases in algal populations in the main reservoir. However, the effect on the reservoir as a whole would be negligible. There would be no significant effects of the new lagoons on the inflows and mixing of freshwater in the main reservoir itself, or of water levels or water quality in the main reservoir or its feeder streams.

Cultural Heritage

Areas A and D are already part of the main reservoir and there would be no risk of archaeological impact. There are various known artefacts in Areas B and C which would be recorded and removed to safekeeping where possible. The proposed habitat creation works would also necessitate the removal of the hedgerow that marks the parish boundary between Egleton and Hambleton. Although there would be no direct disturbance to St Edmund's Church and the Grade II listed buildings in Egleton their historical setting would be temporarily affected during the construction of the new lagoons. However, once complete, the design of the lagoons avoids significant effect on the cultural setting of the village.

Groundwater

There is an outcrop of porous "Marlstone" rock at the western end of the Rutland Water area. Where the lagoons cut into this layer, they would be lined with clay to prevent water draining into the porous rock. A groundwater level monitoring system would be installed to check that levels were not increased and, if required, a pressure relief system would be constructed if required to prevent adverse effects on flow and levels of groundwater in the area.

Conclusion

The proposed new lagoons are required by the European Habitats Directive to mitigate and compensate for potential effects of increased water abstraction on the important habitats of Rutland Water. They would largely fit with the visual character and cultural heritage of the area and provide benefits to the biodiversity and bird watching interest of the western end of Rutland Water. Although there would be some disruption and adverse effects during construction, these effects would largely be temporary, lasting only until the new structures are completed and vegetated over.