DISTRICT: BROADLAND, SOUTH NORFOLK

Status: Site of Special Scientific Interest (SSSI) notified under Section 28 of the Wildlife and Countryside Act 1981

Local Planning Authority: Broads Authority

National Grid Reference: TG 330063	Area: 735.83 (ha.) 1818.24 (ac.)
Ordnance Survey Sheet 1:50,000: 134	1:10,000: TG 30 NW, NE, SW, SE
Date Notified (Under 1949 Act): -	Date of Last Revision: -
1954 – Surlingham and Rockland Broads and Strumpshaw Fen 1981 – Buckenham Marshes	1981 – Surlingham and Rockland Broads and Strumpshaw Fen
Date Notified (Under 1981 Act): 1988	Date of Last Revision: –

Other Information:

This is a composite site made up of two former separate SSSIs known as Surlingham and Rockland Broads, and Strumpshaw Fen and Buckenham Marshes, plus two substantial addition. The majority of the site appears in a Nature Conservation Review (Ratcliffe 1977). Substantial areas are managed as nature reserves by the RSPB and NNT.

Description:

The Yare Broads and Marshes are a nationally important wetland site consisting of extensive areas of unreclaimed fen, carr woodland, open water and grazing marsh on shallow fenland peats. The site lies in the middle reaches of the River Yare and is one of the key Broadland sites with great botanical and ornithological interest. The species-rich fens, dykes and unimproved meadows hold an outstanding assemblage of plants including many rare species. An important community of breeding birds is found or the fens and includes most of the typical Broadland species. The only regular wintering flock of bean geese in England frequent the grazing marshes. A Broadland speciality, the swallowtail butterfly is also present in good numbers on the site.

The fenland vegetation is notable for the large areas that are dominated by reed sweetgrass Glyceria maxima, which is infrequent in other Broadland river vally fens. Reed sweet-grass is the primary coloniser around the nutrient-rich broads and forms floating mats of vegetation (hover), extending out into the open water. These areas tend to be rather species-poor but a more diverse fen community occurs where reed *Phragmites* australis is dominant or co-dominant with reed canary-grass Phalaris arundinacea. Typical species include meadowsweet Filipendula ulmaria, marsh thistle Cirsium palustre, angelica Angelica sylvestris, greater spearwort Ranunculus lingua and ragged robin Lychnis flos-cuculi. Several rare species occur in these areas, notably fibrous tussock sedge Carex appropinquata, cowbane Cicuta virosa, marsh pea Lathyrus palustris, marsh sow-thistle Sonchus palustris, milk parsley Peucedanum palustre and marsh fern *Thelypteris palustris*. Further diversity results from the presence of small areas of fen dominated by saw sedge *Cladium mariscus* with frequent bog myrtle *Myrica gale*, but this community is much rarer than in the other Broadland valleys. Mixed scrub on fenland peats occurs on many areas which are no longer managed; common sallow Salix cinerea is abundant with frequent guelder rose Viburnum opulus, alder buckthorn Frangula alnus and wild privet Ligustrum vulgare.

Several unimproved fen meadows are present on the site. The traditional management of summer mowing for hay followed by grazing has favoured a herb-rich sward. Blunt-flowered rush *Juncus subnodulosus* and Yorkshire fog *Holcus lanatus* are dominant where the underlying peats are fairly calcareous and other species include marsh helleborine *Epipactis palustris*, southern marsh orchid *Dactylorhiza praetermissa*, yellow rattle *Rhinanthus minor*, devil's-bit scabious *Succisa pratensis* and grass of parnassus *Parnassia palustris*. Purple moor-grass *Molinia caerulea* and a variety of sedges including small-fruited yellow sedge *Carex serotina* and flea sedge *Carex pulicaris* occur where there are more acidic, nutrient-poor peats. A number of characteristic species are present including cotton-grass *Eriophorum angustifolium*, heath grass *Danthonia decumbens*, meadow thistle *Cirsium dissectum* and tormentil *Potentilla erecta*.

Open water habitats are well-represented in the middle stretches of the Yare. There are several broads but most are directly connected to the nutrient-rich waters in the main river and water plants are poorly-developed in the phytoplankton-dominated waters. However, Strumpshaw Broad has been mud-pumped to remove the enriched sediments and also isolated from the River Yare. This management technique has resulted in clear water and the return of several water plants. The complex network of dykes around the grazing marshes is also isolated from the main river and contains an exceptional assemblage of water plants including several rare species. The most notable is sharpleaved pondweed *Potamogeton acutifolius*, a national rarity that has declined markedly in recent years but is still widespread on the site. Other water plants include frogbit *Hydrocharis morsus-ranae*, water violet *Hottonia palustris*, whorled water milfoil *Myriophyllum verticullatum*, hair-like pondweed *Potamogeton trichoides* and the rare water soldier *Stratiotes aloides*.

Mature alder carr is not widespread in the Yare valley but a well-developed stand of sump alder occurs around Buckenham and Hassingham Broads. The ground flora is typically diverse and contains greater tussock sedge *Carex paniculata*, lesser pond sedge *Carex acutiformis*, yellow flag *Iris pseudacorus*, gipsywort *Lycopus europaeus*, hemp agrimony *Eupatorium cannabinum* and common figwort *Scrophularia nodosa*.

The fens are the breeding site of many species of wetland bird including snipe, water rail, marsh harrier and grasshopper warbler. A large population of cetti's warblers is present and the site is the main stronghold for the species outside Kent. A wide variety of duck nest around the water-bodies and include teal, shoveler, pochard, tufted duck and a nationally important population of gadwall. There is an active heronry in the carr woodland.

The wintering flock of bean geese, which has increased in recent years to a maximum of 329 birds, feeds on Buckenham Marshes and roosts nearby on the site. The marshes also support a nationally important wintering flock of wigeon with a maximum of 7000 birds. Elsewhere on the site there is a wintering roost of up to 8 hen harriers.