Natural area: 6. Lower Tees	Lowland Grassland Significance: **NEGLIGIBLE**

Description:
A low-lying area centred on the River Tees and its estuary and flanked to the south and west by the Durham Magnesian limestone and to the south and South-west by the North York Moors. The area is dominated by industry and urban development associated with the Middlesborough-Stockton-on-Tees conurbation. The area is underlain by Permo-Triassic mudstones and sandstones which are covered by glacial drift. Inland from the coast, little semi-natural habitat remains and the area supports very little lowland semi-natural grassland.

Key Grassland Types:
1. Neutral grassland (MG5, MG11)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:

Associated interests:
1. Breeding and wintering birds associated with wet unimproved neutral grassland and semi-improved/reverted neutral grassland including coastal grazing marsh

Key Issues:
- Opportunities for grassland creation on farmland and in ex-industrial land
- Pressure for land use change (industrial development) near or on the coast

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in structure/development plans

Natural area: 7. Yorkshire Dales	Lowland Grassland Significance: **OUTSTANDING**

Description:
An upland area forming part of the Northern Pennines dominated by Carboniferous limestone rocks and rising to over 650m. The area is pastoral and consists of a variety of vegetation communities, both enclosed and unenclosed. The higher unenclosed communities consist of limestone grassland and pavement and acid dwarf shrub heath, grassland and blanket mire where locally gritstone outcrops or peat deposits mask the limestone. The enclosed land in the "dales" supports principally grassland, soligenous mire and woodland. The enclosed grasslands are of outstanding importance for nature conservation particularly the northern neutral hay meadows and the neutral and limestone pastures.

Key Grassland Types:

1. **Neutral grasslands in upland valleys (MG3, MG5, MG8)**
2. **Enclosed limestone grassland (CG2, CG9b)**
3. **Tall-herb/neutral grassland (MG2)**
4. Metalliferous grassland (Calaminarian grassland) (OV37)
5. Fen meadow/rush pasture (M23, M26, M27)
6. Enclosed acid grassland (U4)

Nationally Rare & Scarce Grassland Plant Species:
Alchemilla monticola, A. subcrenata, Carex ornithopoda, Crepis mollis, Cypripedium calceolus, Epipactis atrorubens, Euphrasia rostkoviana subsp montana, E. rostkoviana subsp rostkoviana, Hornungia petraea, Minuartia verna, Orchis ustulata, Polygala amarella, Potentilla neumanniana, Primula farinosa, Sesleria albicans, Thlaspi caerulescens

Key sites:
Coniston Old Pasture, Malham Arncliffe, North Pennine Dales Meadows pSAC (includes Cautley Thwaite, New House Meadows), Oxclose, Skoska Wood

Associated interests:

1. Breeding birds associated with neutral meadows and pastures (including semi-improved swards), rush pasture and fen meadows
2. Limestone pavement/screes/rocks
3. Flushes (eg M10) associated with meadows and limestone grassland

Key Issues:

- Pressure for agricultural intensification - change from hay to silage on meadows, use of artificial fertilisers and slurry and overgrazing of enclosed limestone grassland
- Rabbit numbers and overgrazing impacts
- Opportunities for grassland restoration/creation on enclosed land

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 8. The Vales of Yorkshire	Lowland Grassland Significance: **CONSIDERABLE**

Description:
A low-lying, intensively farmed area extending from the Humber Estuary northwards to the northern boundary of North Yorkshire and including the Vale of Pickering as an eastern outlier.
The main vale is underlain by Triassic mudstones and sandstones while the Vale of Pickering is underlain by Jurassic clays. Glacial activity has resulted in the area being covered by drift and a range of depositional features occur including the moraine which traverses the southern part of the vale.

While predominantly an arable farming landscape, some important concentrations of wet grassland remain in the river valleys such as those of the lower Derwent, Wharfe and Ouse. Areas of acid grassland also occur in association with dwarf shrub heath on the glacial sands.

Key Grassland Types
1. **Wet neutral grassland, fen meadow & rush pasture (MG4, MG11, MG13, M22, M23)**
2. Dry neutral grassland (MG5)
3. Acid grassland (U1)

Nationally Rare & Scarce Grassland Plant Species:
Lathyrus palustris, Oenanthe silaifolia

Key sites:
Aubert Ings, Lower Derwent Valley pSAC (includes Derwent Ings), Vale of York Heaths (particularly Strensall Common)

Associated interests:
1. Swamp and aquatic communities including flora.
2. Invertebrate fauna of ditches
3. Breeding and wintering birds of wet grassland/fen meadow/rush pasture including semi-improved/reverted wet neutral grassland (MG6, MG7, MG9, MG10)

Key Issues:
- Lack of grazing/ undergrazing (especially aftermath grazing of hay meadows)
- Hydrology - lowered water tables/reduced flooding frequencies
- Opportunities for creation of neutral grassland on farmland
- Pressure for agricultural intensification
- Industrial development especially mineral working

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure that strong policies for grassland conservation appear in the structure/development plans

Natural area: 9. North York Moors	Lowland Grassland Significance: **NOTABLE**

Description:
An extensive tract of upland composed of a varied series of rocks of Jurassic age including sandstones, shales, ironstones, grits and limestones. The plateau, which lies at an altitude of c.300m is cut by deep, steep-sided dales, the former supporting mostly unenclosed dry dwarf-shrub heath and acid grassland. The valleys contain areas of broad-leaved woodland, soligenous mires and some enclosed semi-natural grassland. The area is principally pastoral but there are some large coniferous plantations.

The area is of interest for its enclosed grasslands particularly the limestone grassland in the southern part of the area. Neutral unimproved valley hay meadows are surprisingly scarce in contrast to other upland tracts in England such as the Yorkshire Dales.

Key Grassland Types:
1. **Calcareous (Jurassic Corallian limestone) grassland (CG2c,d)**
2. Fen meadows (M22, M23)
3. Enclosed neutral grassland (MG5)

Nationally Rare & Scarce Grassland Plant Species:
Dianthus deltoides, Orchis ustulata

Key sites:
Snaper Farm Meadows

Associated interests:
1. Invertebrates associated with calcareous grassland

Key Issues:
- Lack of grazing/under grazing of limestone grassland and fen meadows
- Restoration of limestone grassland
- Opportunities for grassland restoration/creation on farmland
- Pressure for agricultural intensification

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 10. Yorkshire Wolds	Lowland Grassland Significance: **SIGNIFICANT**

Description:
A rolling range of Cretaceous chalk hills and dry valleys extending from the Humber shore in the south to the scarp slope in the north overlooking the Vale of Pickering rising to a maximum altitude of 250m. The chalk forms the cliffs at Flamborough and Bempton on the East Yorkshire coast. The Yorkshire Wolds is an area of intensive arable farming with large fields and little woodland cover. The majority of semi-natural habitat is confined to the steep-sided dry valleys or the west and north-facing scarp slopes. Much of the remaining semi-natural vegetation is calcareous grassland and scrub.

The area is of significant interest for its calcareous grasslands and in particular, its geographical position has given rise to a distinct floristic and faunistic composition which includes few of the southern continental calcicole species but contains a number of species with a northern distribution.

Key Grassland Types:

1. **Calcareous (chalk) grassland (CG2c, CG2d, CG3, CG4a, CG4b, CG6, CG7a) + MG5b and acid, U4 related communities on north-facing chalk slopes.**

Nationally Rare & Scarce Grassland Plant Species:
Linum perenne ssp anglicum, Potentilla neumanniana

Key sites:
East Heslerton Brow, East Dale (part of Fordon Chalk Grasslands), Millington Wood & Pastures, Nine Springs Dale, Thixendale & Long Dale, Waterdale

Associated interests:
1. Invertebrates of calcareous grassland and scrub
2. Breeding and wintering birds of dry grassland and scrub

Key Issues:

- Lack of grazing /undergrazing
- Pressure for agricultural intensification
- Restoration of chalk grassland
- Opportunities for chalk grassland creation on farmland
- Tree planting on chalk grassland

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure forestry/woodland strategies/subject plans and appropriate authorities recognise the importance of semi-natural grassland

Natural area: 11. Plain of Holderness	Lowland Grassland Significance : **NOTABLE**

Description:
A low-lying, intensively farmed area lying to the east and south of the Chalk wolds, bounded to the south by the Humber estuary and in the east by the North Sea coast. The chalk of the Plain is wholly covered by glacial drift, particularly boulder clay.

Although only small fragments of semi-natural grassland remain, the concentration of wet neutral meadow within the Lambwath valley is notable in view of the national rarity of this grassland type.

Key Grassland Types:
1. **Wet neutral grassland (MG4)**
2. Fen Meadow/Rush pasture (M22)
3. Dry neutral grassland (MG5)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:
Lambwath Meadows

Associated interests:

Key Issues:
- Lack of agricultural management especially grazing and undergrazing (especially lack of aftermath grazing of hay meadows)
- Pressure for agricultural intensification
- Opportunities for grassland creation on farmland
- Hydrology - lowered water tables and reduced flooding frequency of wet grassland

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 12. Southern Pennines	Lowland Grassland Significance: **SOME**

Description:
An upland area dominated by acid Millstone Grit rocks. The unenclosed land consists of dwarf shrub heath, blanket mire and acid grassland utilised for hill grazing. The valleys, which have been cut by rivers, have been largely enclosed and a few semi-natural meadows and pastures remain in a matrix of improved and semi-improved grassland.

Key Grassland Types:
1. Upland valley neutral meadows and pastures (MG3, MG5, MG8)
2. Rush pasture (M23)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:

Associated interests:
1. Use of unimproved meadows by seed-feeding Twite *Acanthis flavirostis* during the breeding season

Key Issues:
- Pressure for agricultural intensification (use of fertilisers, conversion from hay to silage etc)
- Overgrazing by horses
- Opportunities for grassland restoration/creation on enclosed farmland

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 13. Coal Measures	Lowland Grassland Significance: **NEGLIGIBLE**

Description:
This area is based on the Carboniferous Coal Measures and is flanked by the Pennines to the north and west and by the Magnesian limestone to the east. The sandstones and shales give rise to mostly neutral and acid soils which, outside of the urban areas, support mixed farming. The area is moderate in altitude and rises to a maximum of 250m.

It is a densely populated and industrialised area and includes the Leeds/Bradford and Sheffield/Rotherham conurbations. Areas of semi-natural grassland are very scarce although there are a few fragments of neutral grassland, fen meadow and acid grassland.

Key Grassland Types:
1. Dry neutral grassland (MG5a,b,c)
2. Fen Meadow/Rush pasture (M22, M23)
3. Acid grassland (U2, U4)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:

Associated interests:
1. Acid grassland often occurs in a mosaic with dwarf shrub heath

Key Issues:
- Pressure for urban/industrial development
- Pressure for agricultural intensification
- Lack of grazing/mowing
- Overgrazing by horses
- Opportunities for grassland creation on farmland
- Opportunities for grassland creation in urban centres and their use as an educational resource

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Explore the use of urban grasslands as an learning resource
- Seek to ensure strong policies for grassland conservation appear in structure/development plans

Natural area: 14. Southern Magnesian Limestone	Lowland Grassland Significance: **NOTABLE**

Description:
The narrow outcrop of the Permian limestone passes through Derbyshire, South, West and North Yorkshire and Nottinghamshire. The landscape is mostly gently undulating and is largely intensively farmed. Occasionally, river erosion has produced steep limestone cliffs in places such as at Cresswell Crags, Grimbalds Crag at Knaresborough and Markland Grips.

Small areas of limestone grassland remain mostly on valley slopes, crags and within disused quarries. The area of grassland is small but its significance is considered notable as a substantial proportion of the total area of Permian (Magnesian) limestone grassland in England occurs in this Natural Area despite the fact that when considered in terms of the extent of calcareous grassland NVC communities, the area would be of limited significance. The area would also appear to offer opportunities for the recreation of limestone grassland.

Springs emanating from the limestone give rise to base-rich fen meadow communities, particularly in the North Yorkshire part of the Natural Area.

Key Grassland Types:
1. **Calcareous (Magnesian (Permian) limestone) grassland (CG2,CG3, CG4, CG5)**
2. Neutral grassland (MG5)
3. Fen Meadow (M22)

Nationally Rare & Scarce Grassland Plant Species:
Carex ericetorum, C. montana, Minuartia hybrida, Potentilla neumanniana, Primula farinosa, Pulsatilla vulgaris, Orchis ustulata

Key sites:

Associated interests:
1. Magnesian limestone cliff/crag communities
2. Invertebrates associated with calcareous grassland

Key Issues:
- Lack of grazing management/undergrazing
- Pressure for agricultural intensification
- Achieving grazing inhibited by vandalism of fences, presence of dogs, isolation and small size of sites
- Opportunities for creation of grassland on farmland
- Hydrology - maintenance of water tables/water quality

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 15. Humberhead Levels	Lowland Grassland Significance: **SOME**

Description:
A low-lying area traversed by the lower courses of major rivers such as the Trent, Aire and Ouse. The geology consists of Triassic sandstones and mudstones overlain by glacial drift. An area of intensive arable farming but particularly notable for the Thorne-Hatfield raised mire complex.

Small pockets of semi-natural dry neutral grassland occur, often in association with knolls of Triassic rocks while river flood plains support areas of both semi-natural and semi-improved damp neutral meadow and pasture which are of significance for breeding waders and wildfowl.

Key Grassland Types:
1. Dry Neutral grassland (MG5)
2. Wet neutral grassland (MG4 and MG11)

Nationally Rare & Scarce Grassland Plant Species:
Orchis ustulata, Rhinanthus angustifolia

Key sites:

Associated interests:
1. Breeding and wintering birds associated with unimproved and semi-improved/reverted wet neutral grassland (MG6, MG9, MG10)

Key Issues:
- Lack of aftermath grazing of neutral meadows
- Pressure for agricultural intensification (use of fertilisers, slurry)
- Hydrology - lowered water tables in vicinity of wet grassland
- Opportunities for grassland creation on farmland including use as buffer land

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 16. Coversands	Lowland Grassland Significance: **SOME**

Description:
The area, lying between the Humber Estuary and North Lincolnshire, is dominated by the post-glacial Coversands which are deposited over Jurassic limestones, ironstones and shales

The landscape is gently rolling, rarely exceeds 70m and consists largely of intensive arable farmland with some broadleaved and coniferous woodland.

Heathland is probably the key semi-natural habitat in the area occurring on the acid sandy soils. Small areas of limestone and acid grassland occur, the latter often in association with the heathland and the former with disused quarries.

Key Grassland Types:
1. Calcareous (Jurassic limestone) grassland (CG3, CG4, CG5, CG7)
2. Acid grassland (U1, U2, U4)

Nationally Rare & Scarce Grassland Plant Species:
Carex ericetorum, Crassula tillaea, Hypochaeris glabra, Teucrium botrys

Key sites:
Risby Warren

Associated interests:
Acid grassland occurs as a component of the Coversand grass-heath

Key Issues:
- Lack of management especially grazing management and undergrazing
- Pressure for agricultural intensification
- Pressure for industrial development particularly sand extraction
- Opportunities for creation of acid grassland/heathland on farmland and limestone/acid grassland in disused quarries
- High rabbit numbers on farmland inhibiting attractiveness of grassland creation to landowners

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in structure/development plans

Natural area: 17. Sherwood Forest	Lowland Grassland Significance: **SOME**

Description:
The area situated in western Nottinghamshire is underlain by Triassic Bunter sandstone which gives rise to free-draining acidic soils.

The area is rolling in nature and lies at an average altitude of 125m. It is largely intensively farmed although substantial tracts of broad-leaved woodland and wood pasture still occur.

Acid grassland occurs in association with the remaining fragments of lowland dwarf-shrub heath.

Key Grassland Types:
1. Acid grassland (U1, U2, U4)

Nationally Rare & Scarce Grassland Plant Species:
Carex montana, Dianthus deltoides, Hypochaeris glabra

Key sites:

Associated interests:
1. Acid grassland forms a mosaic with heathland (H9)
2. Breeding birds associated with heath/acid grassland.
3. Invertebrates associated with heath/acid grassland

Key Issues:
- Lack of grazing/undergrazing
- Pressure for urban development
- Opportunities for grassland creation on farmland

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in structure/development plans

Natural area: 18. Trent Valley and Levels	Lowland Grassland Significance: **NOTABLE**

Description:
An area of low-lying rolling terrain which consists of intensive mixed farming traversed by the River Trent and its tributaries. The area is mostly underlain by Triassic mudstones and sandstones and Jurassic Lower Lias shales, clays and limestones with outcrops of the latter often forming well-wooded ridges.

A large number of small neutral meadows and pastures are scattered across a wide area and these are the most important grassland type in the Natural Area. Small, but significant areas of limestone and acid grassland also occur, the latter where outcrops of igneous Diorite and Carboniferous sandstone give rise to acidic free-draining soils.

Key Grassland Types:
1. **Dry neutral grassland (MG5a,b)**
2. **Wet neutral grassland (MG4, MG11)**
3. Calcareous grassland on Jurassic clays/limestones and Carboniferous limestone (CG2, CG3, CG4, CG5)
4. Acid grassland (U1, U2, U4)

Nationally Rare & Scarce Grassland Plant Species:
Dianthus armeria, Oenanthe silaifolia

Key sites:
Muston Meadows

Associated interests:
1. Breeding birds of wet grassland

Key Issues:
- Pressure for agricultural intensification including conversion from hay to silage
- Lack of or inappropriate agricultural management especially lack of aftermath grazing of meadows
- Overgrazing by horses
- Opportunities for grassland creation on farmland and in disused mineral workings
- Pressure for industrial development especially mineral extraction
- Hydrology - maintenance of water tables and flooding regimes on wet grassland

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in structure/development plans

Natural area: 19. Charnwood Forest	Lowland Grassland Significance: **NOTABLE**

Description:
This area rises from the surrounding plain north-west of Leicester forming a series of rocky hills and valleys which reach nearly 300m. The area is made up of hard ancient Pre-Cambrian rocks including slates, granites and grits which have been exposed by the wearing away of the mudstones which once surrounded them.

Land use is principally pastoral agriculture and forestry and there are substantial areas of mineral extraction. The area supports an important concentration of semi-natural habitat including a notable area of acid grassland.

Key Grassland Types:
1. **Acid grassland (U1, U2, U4)**
2. Neutral grassland (MG5c)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:

Associated interests:
1. Acid grassland often occurs in a mosaic with heathland
2. Breeding birds associated with heathland and acid grassland.

Key Issues:
- Lack of grazing/undergrazing
- Pressure for agricultural intensification
- Opportunities for grassland creation on farmland
- Pressure for land use change - mineral extraction
- Pressure for tree planting on acid grassland

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in development/structure plans
- Seek to ensure forestry/woodland strategies/subject plans and appropriate authorities recognise the importance of semi-natural grassland

Natural area: 20. Lincolnshire Limestone	Lowland Grassland Significance: **NOTABLE**

Description:
This area is centred on a ridge of Jurassic limestone rising to 160m and running north-south from the northern borders of Northamptonshire and Cambridgeshire to south Humberside. An area of mixed farming but with some important concentrations of ancient semi-natural woodland.

Some important calcareous grasslands occur, such as the sites at Barnack and Collyweston, although many are in secondary situations such as former quarries and roadside verges.

Key Grassland Types:
1. **Calcareous (Jurassic limestone) grassland (CG2, CG3a,b,c, CG4a,b,c, CG5a, CG7a, MG5b)**
2. Dry neutral grassland (MG5a, b)
3. Fen meadow/rush pasture (M22a, M23, M24, M25)

Nationally Rare & Scarce Grassland Plant Species:
Aceras anthropophorum, Armeria maritima subsp. elongata, Carex ericetorum, Cerastium pumilum, Euphrasia pseudokerneri, Gentianella anglica, Hypochaeris maculata, Linum perenne subsp. anglicum, Minuartia hybrida, Orchis ustulata, Potentilla neumanniana, Pulsatilla vulgaris, Thesium humifusum, Trifolium ochroleucon, Vulpia unilateralis.

Key sites:
Ancaster Valley, Barnack Hills & Holes, Castor Hanglands, Cribbs Lodge Meadow, Moor Closes, Ancaster.

Associated interests:
1. Invertebrates associated with calcareous grassland and scrub.
2. Limestone heath

Key Issues:
- Lack of grazing/undergrazing
- Opportunities for creation of grassland on farmland
- Roadside verge management - support important resource of limestone grassland
- Hydrology - maintenance of water tables/water quality

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 21. Lincolnshire Clay Vales	Lowland Grassland Significance: **SOME**

Description:
A low-lying wide clay vale with much intensive arable land but with significant concentrations of semi-natural woodland and heathland.

The vale is underlain by Jurassic clays overlain with glacial boulder clays and, in the south, by fen edge sands and gravels.

In a grassland context, the remaining areas of species-rich neutral grassland are of some significance despite their fragmented nature and small size.

Key Grassland Types:
1. Dry neutral grassland (MG5a,b,c)
2. Acid grassland (U1, U2)
3. Fen meadow/rush pasture (M22, M23)

Nationally Rare & Scarce Grassland Plant Species:
Dianthus armeria

Key sites:

Associated interests:
1. Acid grassland occurs in a mosaic with wet and dry heathland

Key Issues:
- Pressure for agricultural intensification including conversion of semi-natural grassland to arable/improved grassland
- Lack of grazing/undergrazing
- Opportunities for grassland creation on farmland

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 22. Lincolnshire Wolds	Lowland Grassland Significance: **SOME**

Description:
The Lincolnshire Wolds consist of a series of rolling chalk hills and valleys rising to *c.*160m, its western escarpment bounding the clay vale of the Ancholme and Witham while the eastern edge overlooks the coastal plain and marshes. The chalk is overlain in places by glacial boulder clay and in areas the chalk has been eroded to expose older non-calcareous Cretaceous rocks. The Wolds are dominated by intensive arable farming and only small fragments of chalk grassland remain on steep valley slopes and in disused quarries. Small areas of base-rich fen meadow/marsh occur locally in association with springs emanating from the base of the chalk.

Key Grassland Types:
1. Calcareous (Chalk) grassland (CG2a,d, CG3a,b,c,d, CG4a,b,c, CG5a,b, CG6, CG7 + MG5b on chalk)
2. Fen Meadow (M22)

Nationally Rare & Scarce Grassland Plant Species:
Minuartia hybrida

Key sites:
Calceby Marsh

Associated interests:
1. Breeding birds of dry grassland
2. Invertebrates associated with chalk grassland

Key Issues:
- Lack of grazing/undergrazing of chalk grassland and fen meadows
- Opportunities for grassland creation on farmland

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 23. Lincolnshire Marsh and Coast	Lowland Grassland Significance: **SOME**

Description:
A low-lying area bounded to the west by the Lincolnshire Wolds , the east by the North Sea coast and to the south by the Fens. The area is underlain by superficial deposits including boulder clay, gravels and marine alluvium which overlie the Cretaceous rocks especially chalk.

The Plain consists mostly of intensively farmed arable land and areas of semi-natural habitat are scarce inland from the coast.

A few small fragments of species-rich neutral grassland occur inland such as at Bratoft and there are a few expanses of wet coastal neutral grassland primarily of importance for breeding and wintering birds.

Key Grassland Types:
1. Dry neutral grassland (MG5)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:
Bratoft Meadows

Associated interests:
1. Breeding and wintering birds associated with semi-improved/reverted wet neutral grassland including coastal grazing marsh.

Key Issues:

- Lack of grazing/undergrazing
- Opportunities for grassland creation on farmland

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource

Natural area: 24. Middle England	Lowland Grassland Significance: **SIGNIFICANT**

Description:
A large, gently rolling area rarely exceeding 150m and underlain by Jurassic rocks including clays, limestones and sandstones, the latter forming an escarpment where it outcrops. Much of the older underlying rocks are, however, masked by glacial sands, gravels and clays.

An area of intensive mixed farming supporting areas of neutral alluvial flood meadow in the valleys of rivers such as the Nene, Welland and Ouse and neutral old meadow and pasture on drier ground.

Sites such as Portholme and Castor Flood Meadows comprise some of the larger blocks of alluvial flood meadow remaining in England.

Key Grassland Types:
1. **Dry neutral grassland (MG5a,b)**
2. **Wet neutral grassland (flood meadow) (MG4), inundation grassland (MG11)**
3. Fen meadow (M22)

Nationally Rare & Scarce Grassland Plant Species:
Dianthus armeria, Fritillaria meleagris, Minuartia hybrida, Oenanthe silaifolia, Trifolium ochroleucon.

Key sites:
Brampton Racecourse, Sudborough Green Lodge Meadows, Portholme, Upwood Meadows.

Associated interests:
1. Breeding and wintering birds associated with wet grassland

Key Issues:
- Lack of grazing/undergrazing including lack of aftermath grazing of meadows
- Hydrology - lowered water tables due to drainage, gravel extraction
- Opportunities for grassland creation on farmland
- Pressure for agricultural intensification
- Pressure for development, especially new roads

Key Objectives:
- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure strong policies for grassland conservation appear in development/structure plans

Natural area: 26. Bedfordshire Greensand	Lowland Grassland Significance: **SOME**

Description:
This Natural Area is based on the Lower Greensand ridge which runs SW-NE across Bedfordshire. Much of the Greensand is overlain by glacial boulder clay but where it outcrops, the light sandy acid soils can support semi-natural acid vegetation communities including heathland, grassland and woodland. The area has a large amount of intensive farmland with some extensive tracts of coniferous plantation.

Key Grassland Types:
1. Acid grassland (U1, U2)
2. Neutral grassland (MG5)
3. Fen meadow (M24, M27)

Nationally Rare & Scarce Grassland Plant Species:

Key sites:

Associated interests:
1. Acid grassland often occurs in association with lowland heathland.
2. Invertebrates associated with acid grassland/heathland
3. Rare/scarce macrofungi

Key Issues:
- Lack of grazing/undergrazing
- Pressure for development especially mineral working
- Recreational pressure
- Hydrology - maintenance of water tables
- Opportunities for grassland creation

Key Objectives:

- Maintain the current extent of semi-natural grassland in favourable conservation status
- Restore semi-natural grassland in sub-optimal condition to optimal condition
- Seek opportunities to expand the grassland resource
- Seek to ensure that strong policies for grassland conservation appear in development/structure/subject plans