# **RAMSAR INFORMATION SHEET**

# FOR WETLANDS OF INTERNATIONAL IMPORTANCE

Site	e reference number					
1	Compilation date	15/03/2002				
2	Country	UK (Northern Irel	and)			
3	Name of wetland	Turmennan Lough	ı			
4	Site centre location:	Latitude: 54 22 46	N Lon	gitude:	05 42 51 W	7
5	Altitude (m)	Min: 20	Max:	40	Mean	25
6	Area (ha)	14.83				

# 7 Overview

The valley mire, transitional between fen and bog, is characterised by a broad range of surface conditions, ranging from slightly base-rich to markedly acidic, influenced by the position of the ground watertable in the surface peat layer, which is partly related to the extent of past peat-cutting over the site. The main plant community of the mire surface is an extensive mixed sedge sward dominated by Bottle Sedge Carex rostrata, growing over a carpet of brown mosses that are replaced by Sphagnum bog-mosses where the water is more acidic. The central area at Turmennan consists of swamp dominated by Common Reed Phragmites australis, with other associated fen species. Other, more localised fen communities within the area include a mixed sedge sward dominated by Lesser Tussock-sedge Carex diandra, floating mats of Bogbean Menyanthes trifoliata and "soakways" with the notable Marsh St John's-wort *Hypericum elodes* prominent. Additional diversity is provided by a range of other habitats, including wet heath associated with areas of more acidic peat, scattered pockets of species-rich wet grassland, areas of species-rich dry grassland on thinner soils over rocky outcrops and small pockets of woodland and scrub. Turmennan contains a number of rare plants, including Floating Club-rush *Eleogiton fluitans* and Least Bur-reed *Sparganium natans*. The diversity of wetland habitats also supports a rich invertebrate community that includes notable water beetles and several locally distributed species of Odonata. Thirtynine species of aquatic Coleoptera have been recorded, including many of the uncommon and rare fen species characteristic of the best fen sites in Down and Armagh.

#### 8 Wetland type Inland wetland

Code	Name	% Area
Ts	Freshwater marshes / pools: seasonal / intermittent	10
U	Peatlands (including peat bogs swamps, fens)	50
W	Shrub-dominated wetlands	10
Xf	Freshwater, tree-dominated wetlands	5
4	Seasonally flooded agricultural land	15
Other	Grasslands	10

9 10	Ramsar Criteria Map of the site		$\frac{1}{}$
11	Compiler		Joint Nature Conservation Committee
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# **12** Justification of criteria

Criterion 1 - Turmennan is a lowland valley mire with a range of edaphic conditions.

# 13 General location

Turmennan is situated some 5km north of Downpatrick within the drumlin belt of County Down, in the south-east of Northern Ireland.

Administrative Region: Down

#### 14 Physical Features

Soil & Geology	acidic, mud, nutrient-rich, peat, sandstone, slate/shale	
Geomorphology and Landscape	lowland, valley	
Nutrient status	mesotrophic	
pH	acidic, circumneutral	
Salinity	fresh	
Soil	mainly organic	
Water permanence	usually permanent	
Summary of main climatic features	"Rainy, temperate climate with a mild winter and periodic frost. Mean minimum temperature approximately 6.7°C. Mean maximum temperature approximately 13.4°C. Mean annual precipitation approximately 818.7mm, with a winter maximum. "	

# 15 Hydrological values

Flood water storage / desynchronisation of flood peaks

# 16 Ecological features

The main plant community of the mire surface is formed by an extensive mixed sedge sward dominated by Bottle Sedge *Carex rostrata* and includes species such as Common Sedge *Carex nigra*, Star Sedge Carex echinata, Ragged-Robin Lychnis flos-cuculi, Marsh Pennywort Hydrocotyle vulgaris and Water Horsetail Equisetum fluviatile. These species grow over a carpet of brown mosses dominated by *Calliergon cuspidatum* and *C. cordifolium*. Where the water is more acidic, Sphagnum bog-mosses such as S. squarrosum and S. subnitens replace the brown mosses. The central area at Turmennan consists of swamp dominated by Common Reed Phragmites australis, with associated plants such as Water Mint Mentha aquatica, Common Marsh-bedstraw Galium palustre, Marsh Cinquefoil Potentilla palustris, Lesser Spearwort Ranunculus flammula, Meadowsweet Filipendula ulmaria, Bulrush Typha latifolia and Creeping Bent Agrostis stolonifera. Other, more localised fen communities within the area include a mixed sedge sward dominated by Lesser Tussock-sedge Carex diandra, floating mats of Bogbean Menyanthes trifoliata and "soakways" with the notable Marsh St John's-wort Hypericum elodes prominent. Turmennan also includes a range of other habitats providing additional diversity. Wet heath is associated with areas of more acidic peat and is dominated by Cross-leaved Heath Erica tetralix and Heather Calluna vulgaris, with Purple Moor-grass Molinia caerulea, Common Cottongrass Eriophorum angustifolium and Bog Asphodel Narthecium ossifragum also present. Scattered pockets of species-rich wet grassland are dominated by Sharp-flowered Rush Juncus acutiflorus and Soft-rush Juncus effusus. On thinner soils over rocky outcrops, there are areas of species-rich dry grassland, dominated by grasses with frequent herbs including Cat's-ear Hypochaeris radicata, Common Bird's-foot-trefoil Lotus corniculatus and Lesser Stitchwort Stellaria graminea, growing over a moss layer dominated by Rhytidiadelphus squarrosus. Small pockets of woodland and scrub are also present. Turmennan contains a number of rare plants, including Floating Club-rush *Eleogiton fluitans* and Least Bur-reed *Sparganium natans*. The diversity of wetland habitats supports a rich invertebrate community, including 39 aquatic Coleoptera species, many of which are uncommon and rare fen species that have been found to be characteristic of the best fen sites in Down and Armagh. Turmennan also supports a number of locally distributed species of Odonata, characterised by the Four-spotted Chaser Libellula quadrimaculata, Large Red Damselfly Pyrrhosoma nymphula, Azure Damselfly Coenagrion puella and Variable Damselfly C. pulchellum. Notable water

beetles include Acilius canaliculatus, Gyrinus natator, Rhantus suturellus, R. grapii, Hydaticus seminiger and Cymbiodyta marginellus. An uncommon species of pondskater Gerris lateralis has also been recorded.

# 17 Noteworthy flora

Nationally important habitats occuring at this site Transition mire

Nationally important species occuring at this site Higher Plants Floating Club-rush *Eleogiton fluitans* Least Bur-reed *Sparganium natans* 

#### 18 Noteworthy fauna

Assemblages of national importance *Aquatic Coleoptera* 

#### **19** Social and Cultural Values

Conservation education

Livestock grazing

#### 20 Land tenure/ownership

Ownership category	On-Site	Off-Site
Private	+	+
Public/communal	+	+

#### 21 Current land use

Activity	On-Site	Off-Site	Scale
Livestock watering hole/pond	+		Large-Scale
Grazing (unspecified)	+	+	Large-Scale

#### 22 Adverse factors affecting the ecological character of the site

Activity	On-Site	Off-Site	Scale
Vegetation succession	+		Large-Scale

#### 23 Conservation measures taken

Conservation measure	On-site	Off-site
Management agreement	+	
Site management statement/plan implemented	+	
ASSI	+	
SAC	+	

# **24** Conservation measures proposed but not yet implemented see below

#### Site vulnerability and management statement

Management Plan and Conservation Objectives identified problems and actions required through Management Agreement.

#### 25 Current scientific research/survey/monitoring and facilities

Monitoring by EHS staff.

#### 26 Current conservation education

Site is a National Nature Reserve with ad hoc usage for conservation education

#### 27 Current recreation and tourism

Site not utilised for recreation or tourism activities

#### 28 Functional jurisdiction

Department of the Environment, Northern Ireland, Clarence Court, 10-18 Adelaide St, Belfast

#### 29 Management authority

Environment and Heritage Service, Commonwealth House, 35 Castle Street, Belfast, BT1 1GU

#### 30 Bibliography

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#### **Specific References**