

# Ramsar Information Sheet

Published on 1 November 2022 Update version, previously published on : 15 December 2014

# Netherlands Broekvelden/Vettenbroek



Designation date 29 August 2000

Site number 1240

Coordinates 52°02'04"N 04°46'12"E

Area 700,00 ha

# Color codes

Fields back-shaded in light blue relate to data and information required only for RIS updates.

Note that some fields concerning aspects of Part 3, the Ecological Character Description of the RIS (tinted in purple), are not expected to be completed as part of a standard RIS, but are included for completeness so as to provide the requested consistency between the RIS and the format of a 'full' Ecological Character Description, as adopted in Resolution X.15 (2008). If a Contracting Party does have information available that is relevant to these fields (for example from a national format Ecological Character Description) it may, if it wishes to, include information in these additional fields.

# 1 - Summary

#### Summary

The site Broekvelden, Vettenbroek en Polder Stein is located in the Groene Hart (Green Heart) of the province of Zuid-Holland. It is a complex of shallow lakes (criss-crossed by strips of land), reed beds and wet meadows. The site is renown for the massively blooming 'wild tulips' (Snake's Head Fritillary), a plant that grows here on clay-on-peat soils near rivers, especially grassland polders around Gouda and Reeuwijk. The species expanded strongly during the Golden Age, when the less productive blue grasslands in this site were made more suitable for agricultural purposes by fertilizing with ditch dredge, cow manure, compost and household waste. Polder Stein, near Reeuwijk, currently houses the last important remnant in the western Netherlands of the once widely distributed hayfields with 'wild tulips'. The open water and grasslands especially serve as foraging and resting areas for water birds.

# 2 - Data & location

# 2.1 - Formal data

# 2.1.1 - Name and address of the compiler of this RIS

Responsible compiler

Institution/agency
Wageningen Environmental Research
PO Box 47
Fostal address
FOOD AA Wageningen
The Netherlands

National Ramsar Administrative Authority

Postal address

Institution/agency Ministry of Agriculture Nature and Food Quality

Bezuidenhoutseweg 73 P.O. Box 20401 2500 EK The Hague The Netherlands

#### 2.1.2 - Period of collection of data and information used to compile the RIS

From year 2015

To year 2020

#### 2.1.3 - Name of the Ramsar Site

Official name (in English, French or Spanish)

Broekvelden/Vettenbroek

# 2.1.4 - Changes to the boundaries and area of the Site since its designation or earlier update

(Update) A. Changes to Site boundary Yes O No 

(Update) B. Changes to Site area

No change to area

(Update) For secretariat only. This update is an extension □

#### 2.1.5 - Changes to the ecological character of the Site

(Update) 6b i. Has the ecological character of the Ramsar Site (including applicable Criteria) changed since the previous RIS?

# 2.2 - Site location

#### 2.2.1 - Defining the Site boundaries

b) Digital map/image

<1 file(s) uploaded>

Former maps 0

Boundaries description

The boundary of the Ramsar site is equal to the Natura 2000-site with the same name.

The Ramsar Site boundaries were aligned with the Natura 2000 site in 2014, resulting in a reduction of 4 ha

#### 2.2.2 - General location

a) In which large administrative region does the site lie?

Di What is the nearest town or population centre?

Zuid-Holland

Gouda with a population of 73.681 in 2021 (Source: CBS, Netherlands Statistics).

#### 2.2.3 - For wetlands on national boundaries only

a) Does the wetland extend onto the territory of one or more other countries?

b) Is the site adjacent to another designated Ramsar Site on the territory of another Contracting Party?

# 2.2.4 - Area of the Site

Official area, in hectares (ha): 700

Area, in hectares (ha) as calculated from 696.586 GIS boundaries

# 2.2.5 - Biogeography

#### Biogeographic regions

Regionalisation scheme	e(s)	Biogeographic region
EU biogeographic regionalization	Atlantic	

# Other biogeographic regionalisation scheme

The bio-geographic regions dataset used, contains the official delineations used in the Habitats Directive (92/43/EEC) and for the EMERALD Network set up under the Convention on the Conservation of European Wildlife and Natural Habitats (Bern Convention).

# 3 - Why is the Site important?

# 3.1 - Ramsar Criteria and their justification

<no data available>

- Criterion 2 : Rare species and threatened ecological communities
- Criterion 3 : Biological diversity

The Ramsar site Broekvelden, Vettenbroek en Polder Stein is designated as a Natura 2000 site (SPA) and can therefore be considered important for maintaining the biodiversity of the Atlantic biogeographic Justification region. Besides the species mentioned under criterion 2, the site has also been designated as a SAC for a range of habitat types (Annex I of Habitats Directive) and SPA for a number of bird species that are not on Annex Lof the Birds Directive.

#### Criterion 4 : Support during critical life cycle stage or in adverse conditions

Optional text box to provide further information

The Ramsar site is also part of the Natura 2000 network in the European Union. It is designated as a Special Protection Area (SPA) for the functions that it provides to specific non-breeding bird species (e.g. migratory, hibernating, sleeping, resting, foraging). The site is also designated as a Special Area of Conservation (SAC) for specific non-bird species (and habitat types, see section 3.4). For detailed information please see Natura 2000 data sheet: https://natura2000.eea.europa.eu/Natura2000/SDF.aspx?site=NL2003039 https://www.natur a2000.nl/gebieden/zuid-holland/broekvelden-vettenbroek-polder-stein

#### ☑ Criterion 5: >20.000 waterbirds

Overall waterbird numbers 58,351

2015 Start year

End year 2020

Source of data: Sovon, Dutch Centre for Field Ornithology

Optional text box to provide further Start season 2015/2016. End season 2019/2020. Peak numbers for all five seasons > 20,000. Average information 58,351 individuals.

#### ☑ Criterion 6 : >1% waterbird population

information (CSR7).

Optional text box to provide further The 1% waterbird population thresholds are based on the 7th Edition of the Conservation Status Report

☑ Criterion 8 : Fish spawning grounds, etc.

Justification

The site is also designated as a Special Area of Conservation (SAC) for two fish species.

3.2 - Plant species whose presence relates to the international importance of the site

Phylum	Scientific name	Criterion 2	Criterion 3	Criterion 4	IUCN Red List	CITES Appendix I	Other status	Justification
Plantae								
TRACHEOPHYTA/ LILIOPSIDA	Fritillaria meleagris	V					National red list species	
TRACHEOPHYTA/ MAGNOLIOPSIDA	Pedicularis palustris	<b></b> ✓			LC		National red list species	

3.3 - Animal species whose presence relates to the international importance of the site

Phylum	Scientific name	Specie qualifie under criterio	es (	Species contributes under criterion	Pop. Size	Period of pop. Est.	% occurrence	IUCN Red List	CITES Appendix I	CMS Appendix I	Other Status	Justification
				5 7 8			,	List				
Fish, Mollusc a	nd Crustacea						ı					
MOLLUSCA/ GASTROPODA	Anisus vorticulus			200c	)			DD			National red list species	The site is also designated as a Special Area of Conservation (SAC) for this species and is part of the Natura 2000 network within the European Union.
CHORDATA/ ACTINOPTERYGII	Cobitis taenia				9			LC				The site is also designated as a Special Area of Conservation (SAC) for this species and is part of the Natura 2000 network within the European Union.
MOLLUSCA/ GASTROPODA	Gyraulus riparius				1						National red list species	
CHORDATA/ ACTINOPTERYGII	Rhodeus amarus				9			LC			National red list species	The site is also designated as a Special Area of Conservation (SAC) for this species and is part of the Natura 2000 network within the European Union.
Birds							<u> </u>					
CHORDATA/ AVES	Anas clypeata	990			322	2015/16-2019/20	0.5	LC			National red list species	Reference population: North-west & Central Europe (win). The site is also designated as a Special Protection Area (SPA) for this species and is part of the Natura 2000 network within the European Union.
CHORDATA / AVES	Anas penelope				50087	2015/16-2019/20	3.6	LC			National red list species	Reference population: Western Siberia & NE Europe/NW Europe. The site is also designated as a Special Protection Area (SPA) for this species and is part of the Natura 2000 network within the European Union.
CHORDATA/ AVES	Anas strepera				1191	2015/16-2019/20	1	LC				Reference population: strepera, North-west Europe. The site is also designated as a Special Protection Area (SPA) for this species and is part of the Natura 2000 network within the European Union.
CHORDATA/ AVES	Anser albifrons				4881	2015/16-2019/20	0.4	LC				Reference population: albifrons, NW Siberia & NE Europe/North-west Europe.
CHORDATA / AVES	Anser anser				2156	2015/16-2019/20	0.2	LC				Reference population: anser, NW Europe/South-west Europe.
CHORDATA/ AVES	Aythya fuligula				513	2015/16-2019/20	0.1	LC				Reference population: North-west Europe (win).
CHORDATA/ AVES	Branta leucopis				3668	2015/16-2019/20	0.3					Reference population: Russia/Germany & Netherlands.
Δ\/ES	Cygnus columbianus bewickii				] 3	2016/16-2019/20	0					Reference population: bewickii, Western Siberia & NE Europe/North-west Europe. The site is also designated as a Special Protection Area (SPA) for this species and is part of the Natura 2000 network within the European Union.
CHORDATA/ AVES	Fulica atra				2396	2015/16-2016/17	0.2	LC				Reference population: atra, North-west Europe (win).
CHORDATA/ AVES	Limosa limosa				132	2015/16-2019/20	0.2	NT			National red list species	Reference population: limosa, Western Europe/NW & West Africa.

<sup>1)</sup> Percentage of the total biogeographic population at the site

Bird data are provided by SOVON, Dutch Centre for Field Ornithology.

The 1% waterbird population thresholds are based on the 7th Edition of the Conservation Status Report (CSR7).

# 3.4 - Ecological communities whose presence relates to the international importance of the site

Name of ecological community	Community qualifies under Criterion 2?	Description	Justification
Hydrophilous tall herb fringe communities of plains			The site is also designated as a Special Area of Conservation (SAC) for this habitat type and is part of the Natura 2000 network within the European Union.
Lowland hay meadows (Alopecurus pratensis, Sanguisorba officinalis)	<b>2</b>		The site is also designated as a Special Area of Conservation (SAC) for this habitat type and is part of the Natura 2000 network within the European Union.

#### Optional text box to provide further information

The site is also designated as a Special Area of Conservation (SAC) for the habitat types listed above and is part of the Natura 2000 network within the European Union.

# 4 - What is the Site like? (Ecological character description)

# 4.1 - Ecological character

The site generally consist of 20% permanent freshwater lakes, 7% permanent freshwater marshes and 70% wet eutrophic grasslands though nutrient poor grasslands with a diverse flora (like Snake's Head Fritillary Cladium mariscus) also still exist. The site is important as moulting and resting place for water birds.

Plant communities of European interest that occur are:

- Potametum lucentis
- Stratiotetum
- Cicuto-Caricetum pseudocyperi
- Thelypterido-alnetum

The ecosystem services mainly refer to:

- the opportunities of the Reeuwijkse plassen for water recreation.
- the ability for agriculture to take fresh water in.

# 4.2 - What wetland type(s) are in the site?

#### Inland wetlands

Wetland types (code and name)	Local name	Ranking of extent (1: greatest - 4: least)	Area (ha) of wetland type	Justification of Criterion 1
Fresh water > Lakes and pools >> 0: Permanent freshwater lakes		1		
Fresh water > Marshes on peat soils >> U: Permanent Nonforested peatlands		3		

#### Human-made wetlands

Wetland types (code and name)	Local name	Ranking of extent (1: greatest - 4: least)	Area (ha) of wetland type
4: Seasonally flooded agricultural land		2	

# 4.3 - Biological components

### 4.3.1 - Plant species

<no data available>

# 4.3.2 - Animal species

<no data available>

# 4.4 - Physical components

#### 4.4.1 - Climate

Climatic region	Subregion
C: Moist Mid-Latitude climate with mild winters	Cfb: Marine west coast (Mild with no dry season, warm summer)

The clim	nate acco	rdina to	Köppen	is rair	nv (Cbf).

# 4.4.2 - Geomorphic setting

- \ N.40	-1			-1/:-		
a) Minimum	elevation	above	sea iev	ei (in	5	
a) Minimum			me	tres)	-5	

a) Maximum elevation above sea level (in metres)

Entire river basin  $\square$ 

Upper part of river basin

RIS for Site no. 1240,	Broekvelden/Vettenbro	ek, Netherlands	
	Middle pa	rt of river basin	
		rt of river basin 🗹	
		one river basin	
		ot in river basin	
	NC	Coastal	
Diagon name the viver besi	in ar basine. If the site lies in a		the larger river basis. For a secretal/marine site, places name the secretary
	ne Rhine catchment is 18		e the larger river basin. For a coastal/marine site, please name the sea or ocean.
4.4.3 - Soil			
		Mineral 🗹	
	(Update) Changes	at RIS update No change	Increase O Decrease O Unknown O
		Organic 🗹	
	(Update) Changes	at RIS update No change 🤄	Increase O Decrease O Unknown O
	No availab	ble information	
Are soil types subject to	o change as a result of changir	ng hydrological	
conditi	ions (e.g., increased salinity or	Yes O No Service (Service)	
Please provide further infor	mation on the soil (optional)		
The general soil types	s are: Alluvial, Brown fore	est soils and montane s	oils.
4.4.4. Water regime			
4.4.4 - Water regime			
Water permanence Presence?	Changes at RIS update		
Usually permanent water present			
present		I	
Source of water that maintain			
Presence? Water inputs from	Predominant water source	Changes at RIS update  No change	
precipitation  Water inputs from			
groundwater		No change	
Water destination			
Presence?	Changes at RIS update		
To downstream catchment	No change	l	
Stability of water regime		1	
Presence? Water levels fluctuating	Changes at RIS update		
(including tidal)	No change		
Water levels largely stable	No change	I	
Please add any comments	on the water regime and its de	eterminants (if relevant). Use	this box to explain sites with complex hydrology:
			The area has no specific hydrological values.
The water level of sev	veral polders and lakes is	s divers. For some the	water level is flexible, while others have a more or less stable water regime.
4.4.5 - Sediment regin	ne		
	Sediment reg	gime unknown 🗖	
Please provide further infor	mation on sediment (optional)	t .	
The sediment regime	is largely stable, althou	gh dredging of ditches i	s on of the nature management actions.
4.4.6. \\\\-1 \\\\\\\\\\\\\\\\\\\\\\\\\\\\			
4.4.6 - Water pH			
		Unknown	
<no available="" data=""></no>			
no data available			
4.4 = 144.4			
4.4.7 - Water salinity			
	F	Fresh (<0.5 g/l) 🗹	
	(Update) Changes	at RIS undate. No change @	Increase O Decrease O Unknown O

RIS for Site no. 1240,	Broekvelden/Vettenbro	ek, Netherlands	
	Mixohaline (brackish)/Mixosal	line (0.5-30 g/l) ₩	
	,		05 000
	(opudio) Changes	Unknown	ease O Decrease O Unknown O
		OHRIOWII C	
4.4.8 - Dissolved or su	spended nutrients in wa	ter	
		Eutrophic 🗹	
	(Update) Changes	s at RIS update No change O Incr	ease O Decrease  Unknown O
		Unknown	
4.4.9 - Features of the	surrounding area which	may affect the Site	
	and if so how, the landscape a surrounding the Ramsar Site	e differ from the i) broadly similar	ii) significantly different <b>⊚</b>
Surrounding a	rea has greater urbanisation o	site itself:	
•	g area has higher human pop		
	ig area has migner numan pop	_	
Surrounding area has sig	gnificantly different land cover o	or nabitat typės 💌	
1.5 - Ecosystem s	services		
1.5.1 - Ecosystem serv	rices/benefits		
Provisioning Services  Ecosystem service	Examples	Importance/Extent/Significance	
Food for humans	Sustenance for humans	Medium	
Wetland non-food products	(e.g., fish, molluscs, grains) Other	Medium	
ultural Services	Evermelee	Immentance /Futent/Piemificance	
Ecosystem service Recreation and tourism	Examples Picnics, outings, touring	Importance/Extent/Significance Medium	
Scientific and educational	Major scientific study site	Medium	
Scientific and educational	Important knowledge systems, importance for research (scientific	Medium	
Scientific and educational	reference area or site) Long-term monitoring site	High	
Supporting Socioos			
Supporting Services  Ecosystem service	Examples	Importance/Extent/Significance	
2000,00000100	Supports a variety of all life forms including plants, animals and	portaneo, <u>L</u> itenao, gimiotino	
Biodiversity	microorganizms, the genes they contain, and the ecosystems of which they form a part	High	
Other ecosystem service(s)	) not included above:		
		obligatory activities in relat	on to the designated Natura 2000 species. SOVON, the Dutch Bird
Research Organisation	on, coordinates for insta	nce a continues national bir	d monitoring program in which it cooperates with 7000 volunteers,
research institutes an Polder Stein).	d organisations in the m	nonitoring of birds throughou	t the Netherlands (among which the Broekvelden, Vettenbroek en
l cider cterrij.			
Boating 55%, Tourish 15%, Water manager		dential (conurbation) 4%, F	arming 25%, Commercial fisheries 55%, Conservation and research
Have studies or assessme	ents been made of the econor	nic valuation of	
ecosy	stem services provided by this	nic valuation of Ramsar Site?	nown <b>®</b>
4.5.2 - Social and cultu	ıral values		
application of traditional k	odel of wetland wise use, den nowledge and methods of ma	nagement and	
	intain the ecological character		
	otional cultural traditions or rec enced the ecological character		

iii) the ecological character of the wetland depends on its interaction  $\hfill\Box$ 

with local communities or indigenous peoples

iv) relevant non-material values such as sacred sites are present and
their existence is strongly linked with the maintenance of the ecological $\Box$
character of the wetland

<no data available>

# 4.6 - Ecological processes

<no data available>

# 5 - How is the Site managed? (Conservation and management)

# 5.1 - Land tenure and responsibilities (Managers)

#### 5.1.1 - Land tenure/ownership

		owners	
I UD	ш	OWITEIS	uip

Category	Within the Ramsar Site	In the surrounding area
National/Federal government	<b>/</b>	

#### Private ownership

Category	Within the Ramsar Site	In the surrounding area
Other types of private/individual owner(s)	<b>2</b>	<b>2</b>

Provide further information on the land tenure / ownership regime (optional):

a) within the Ramsar site:

The site is partly owned by Staatsbosbeheer; the remainder is in private ownership.

b) in the surrounding area:

Several private owners.

# 5.1.2 - Management authority

agency or organization responsible for managing the site:

Please list the local office / offices of any Staatsbosbeheer, see: https://www.staatsbosbeheer.nl/natuurgebieden/groene-hart-reeuwijkse-plassen

Provide the name and/or title of the person or people with responsibility for the wetland:

See https://www.staatsbosbeheer.nl/natuurgebieden/groene-hart-reeuwijkse-plassen

Postal address:

Head office: Staatsbosbeheer, P.O. Box 2, 3800 AA Amersfoort, the Netherlands, tel. +31 (0)30-6926111

E-mail address: info@staatsbosbeheer.nl

# 5.2 - Ecological character threats and responses (Management)

# 5.2.1 - Factors (actual or likely) adversely affecting the Site's ecological character

Agriculture and aquaculture

Factors adversely affecting site	Actual threat	Potential threat	Within the site	Changes	In the surrounding area	Changes
Livestock farming and ranching	Low impact	Low impact	<b>2</b>	No change		No change

### Human intrusions and disturbance

Factors adversely affecting site	Actual threat	Potential threat	Within the site	Changes	In the surrounding area	Changes
Recreational and tourism activities	Medium impact	Medium impact	<b>✓</b>	No change		No change

# Pollution

Factors adversely affecting site	Actual threat	Potential threat	Within the site	Changes	In the surrounding area	Changes
Agricultural and forestry effluents	Medium impact	Medium impact	<b>✓</b>	No change	<b>✓</b>	No change

# 5.2.2 - Legal conservation status

Regional (international) legal designations

Designation type	Name of area	Online information url	Overlap with Ramsar Site
EU Natura 2000	Broekvelden, Vettenbroek & Polder Stein	https://www.natura2000.nl/gebied en/zuid-holland/broekvelden-vett enbroek-polder-stein	whole

National legal designations

Designation type	Name of area	Online information url	Overlap with Ramsar Site
National Ecological Network (NEN)	Broekvelden, Vettenbroek & Polder Stein	https://www.government.nl/topics /nature-and-biodiversity/nationa l- ecological-network-nen	whole

Non-statutory designations

Designation type	Name of area	Online information url	Overlap with Ramsar Site
Important Bird Area	Broekvelden, Vettenbroek & Polder Stein	http://datazone.birdlife.org/sit e/factsheet/1255	whole
Other non-statutory designation	KBA Broekvelden, Vettenbroek & Polder Stein	http://www.keybiodiversityareas. org/site/factsheet/1255	whole

# 5.2.3 - IUCN protected areas categories (2008)

la Strict Nature Reserve
lb Wilderness Area: protected area managed mainly for wilderness protection
Il National Park: protected area managed mainly for ecosystem protection and recreation
III Natural Monument: protected area managed mainly for conservation of specific natural features
IV Habitat/Species Management Area: protected area managed mainly for conservation through management intervention
V Protected Landscape/Seascape: protected area managed mainly for landscape/seascape conservation and recreation
VI Managed Resource Protected Area: protected area managed mainly for the sustainable use of natural ecosystems

<no data available>

# 5.2.4 - Key conservation measures

Legal protection

Logar protoction	
Measures	Status
Legal protection	Implemented

# Habitat

Measures	Status
Habitat manipulation/enhancement	Implemented

### Species

Measures	Status
Threatened/rare species	Implemented
management programmes	

#### Human Activities

Measures	Status
Regulation/management of recreational activities	Implemented
Communication, education, and participation and awareness activities	Implemented
Research	Implemented
Fisheries management/regulation	Implemented
Livestock management/exclusion (excluding fisheries)	Implemented

# 5.2.5 - Management planning

Is there a site-specific management plan for the site? Yes

Has a management effectiveness assessment been undertaken for the site? Yes ◎ No O

If the site is a formal transboundary site as indicated in section Data and location > Site location, are there shared management planning Yes O No opposesses with another Contracting Party?

URL of site-related webpage (if relevant): https://www.natura2000.nl/gebieden/zuid-holland/broekvelden-vettenbroek-polder-stein

# 5.2.6 - Planning for restoration

Is there a site-specific restoration plan? Yes, there is a plan

# 5.2.7 - Monitoring implemented or proposed

Monitoring	Status
Birds	Implemented
Plant community	Implemented
Animal species (please specify)	Implemented

Ongoing biodiversity monitoring is one of the obligatory activities in relation to the designated Natura 2000 species. SOVON, the Dutch Bird Research Organisation, coordinates for instance a continues national bird monitoring program in which it cooperates with 7000 volunteers, research institutes and organisations in the monitoring of birds throughout the Netherlands (among which the Broekvelden, Vettenbroek en Polder Stein).

# 6 - Additional material

# 6.1 - Additional reports and documents

# 6.1.1 - Bibliographical references

The site equals the Natura 2000-boundaries. For up-to-date information and references about the site see https://www.natura2000.nl/gebieden/zuid-holland/broekvelden-vettenbroek-polder-stein.

# 6.1.2 - Additional reports and documents

i. taxonomic lists of plant and animal species occurring in the site (see section 4.3)

ii. a detailed Ecological Character Description (ECD) (in a national format)

iii. a description of the site in a national or regional wetland inventory

iv. relevant Article 3.2 reports

v. site management plan

vi. other published literature

# 6.1.3 - Photograph(s) of the Site

Please provide at least one photograph of the site:



- ( John Janssen, - )

# 6.1.4 - Designation letter and related data

### **Designation letter**

<2 file(s) uploaded>

Date of Designation 2000-08-29