



Ramsar Sites of India

Factsheets



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About this publication

This document is a compilation of information on Ramsar Sites of India. The data presented in this document has been sourced from the Ramsar Information Sheets, Management Action Plans and other publications. The maps are for representation purpose only and not to scale.

मंत्री
पर्यावरण, वन एवं जलवायु परिवर्तन,
सूचना एवं प्रसारण और
भारी उद्योग एवं लोक उद्यम
भारत सरकार



MINISTER
ENVIRONMENT, FOREST & CLIMATE CHANGE,
INFORMATION & BROADCASTING AND
HEAVY INDUSTRIES & PUBLIC ENTERPRISES
GOVERNMENT OF INDIA

प्रकाश जावडेकर
Prakash Javadekar



MESSAGE

I am pleased to present the compilation of factsheets on the 'Ramsar Sites of India'. This compilation is intended to present information about the 37 Ramsar sites of the country in a concise and informative manner. I am happy to know that India has the maximum number of designated Ramsar sites in South Asia.

India is one of the few countries in the world to have a wetland inventory system wherein remote sensing techniques have been used to map the wetlands. A scientific approach to mapping and collecting data on the wetlands is essential to their preservation. The water storage and purification services of the wetlands also align with the Prime Minister's 'Nal se Jal' scheme under the 'Jal Hi Jivan Mission' which aims to provide adequate water supply to all households and to conserve water resources. With the rapidly deteriorating situation of water scarcity, it is imperative to preserve wetlands for posterity.

The compilation reflects the diversity of the Ramsar sites of the country, the values and ecosystem services being provided by them and also the threats being faced in their management. It is a step forward in streamlining the dispersed information on these wetlands and presenting them in an engaging format.

I congratulate the team of MoEF&CC that has put together this compilation. Let us commit ourselves to the continued preservation and sustainable management of not only the Ramsar sites but all the wetlands across the country.

Date: 13.02.2020

(Prakash Javadekar)

॥ प्लास्टिक नहीं, कपड़ा सही ॥



सी.के.मिश्रा
C.K.Mishra



सत्यमेव जयते

सचिव
भारत सरकार
पर्यावरण, वन एवं जलवायु परिवर्तन मंत्रालय
SECRETARY
GOVERNMENT OF INDIA
MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE



FOREWORD

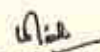
Wetland ecosystems are vital for sustenance and growth of all life forms. These complex ecosystems offer a wide range of services including freshwater supply, food, fibre and raw materials besides playing a role in flood control, water quality improvement, groundwater recharge, recreation and climate change mitigation. These productive ecosystems are thus, of immense ecological, socio-economic as well as cultural importance.

Despite these benefits, wetlands are the first target of human interference, remain the most threatened of all natural resources and are disappearing three times faster than forests. Around 50% of the Earth's wetlands are estimated to already have disappeared through conversion to industrial, agricultural and residential purposes.

To conserve these valuable ecosystems, India became a party to the Ramsar Convention on Wetlands of International Importance in 1982 and has till now designated 37 Ramsar sites of international importance covering an area of 1067939 hectares which are being managed as per the Ramsar mandate.

We are happy to release this compilation of factsheets on the Ramsar sites of the country. The factsheets provide a glimpse of the values and benefits of each site and the threats to their existence and management.

I congratulate the Wetlands Division of the MoEF&CC who with their CEPA partners Wetlands International South Asia (WISA) and WWF-India along with GIZ have come out with this comprehensive document.


[C. K. Mishra]

New Delhi,
13th February, 2020

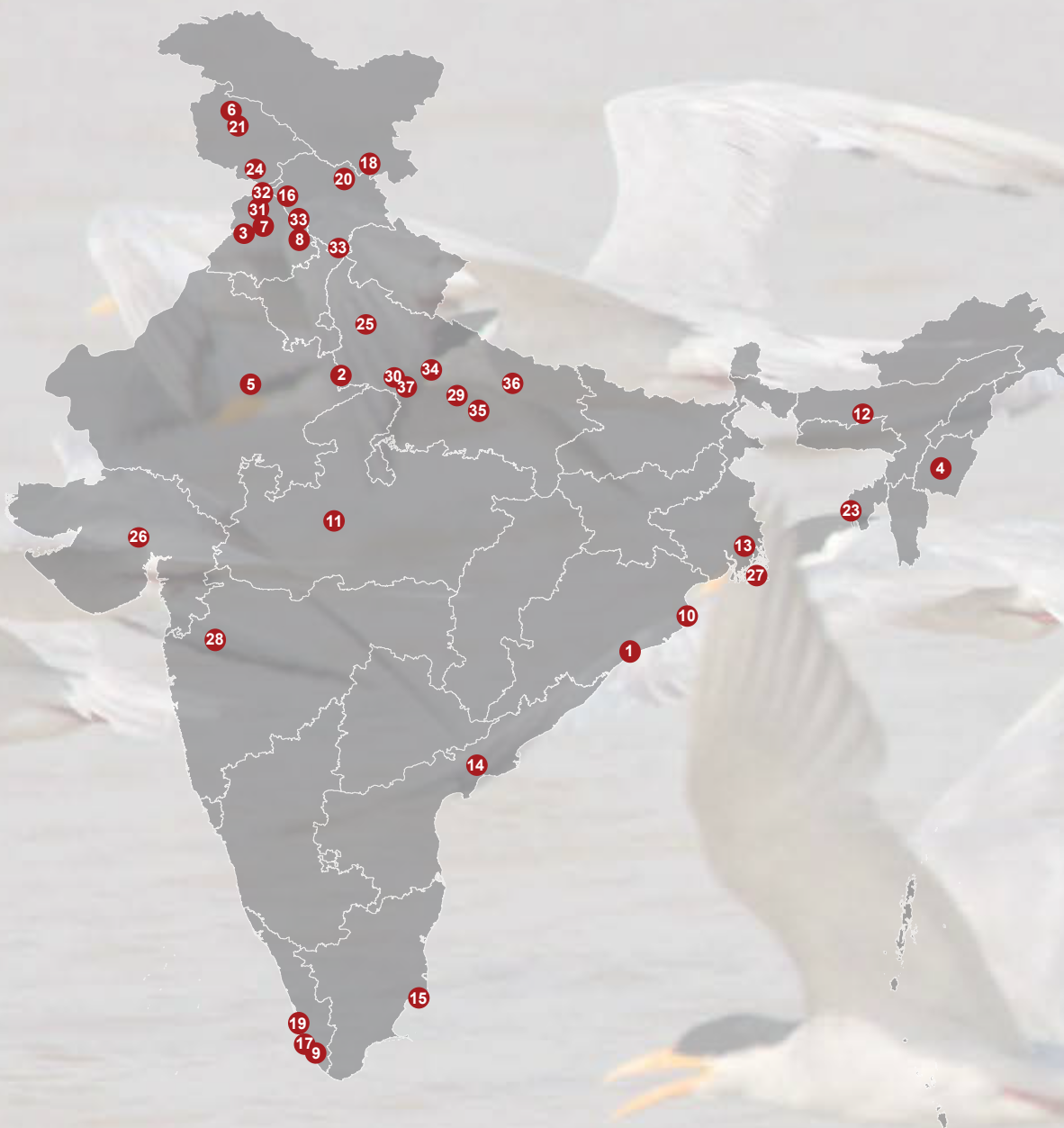
इंदिरा पार्यावरण भवन, जोर बाग रोड, नई दिल्ली-110 003 फोन : (011) 24695262, 24695265, फैक्स : (011) 24695270

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The Ramsar Sites Criteria

The nine criteria for identifying Wetlands of International Importance

Group A of the Criteria. Sites containing representative, rare or unique wetland types

Criterion 1: A wetland should be considered internationally important if it contains a representative, rare, or unique example of a natural or near-natural wetland type found within the appropriate biogeographic region.

Group B of the Criteria. Sites of international importance for conserving biological diversity

Criteria based on species and ecological communities

Criterion 2: A wetland should be considered internationally important if it supports vulnerable, endangered, or critically endangered species or threatened ecological communities.

Criterion 3: A wetland should be considered internationally important if it supports populations of plant and/or animal species important for maintaining the biological diversity of a particular biogeographic region.

Criterion 4: A wetland should be considered internationally important if it supports plant and/or animal species at a critical stage in their life cycles, or provides refuge during adverse conditions.

Specific criteria based on waterbirds

Criterion 5: A wetland should be considered internationally important if it regularly supports 20,000 or more waterbirds.

Criterion 6: A wetland should be considered internationally important if it regularly supports 1% of the individuals in a population of one species or subspecies of waterbird.

Specific criteria based on fish

Criterion 7: A wetland should be considered internationally important if it supports a significant proportion of indigenous fish subspecies, species or families, life-history stages, species interactions and/or populations that are representative of wetland benefits and/or values and thereby contributes to global biological diversity.

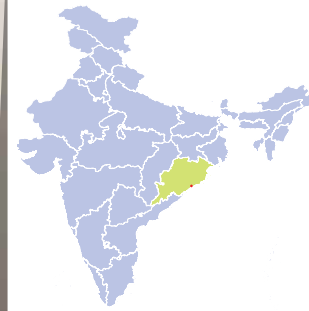
Criterion 8: A wetland should be considered internationally important if it is an important source of food for fishes, spawning ground, nursery and/or migration path on which fish stocks, either within the wetland or elsewhere, depend.

Specific criteria based on other taxa

Criterion 9: A wetland should be considered internationally important if it regularly supports 1% of the individuals in a population of one species or subspecies of wetland-dependent nonavian animal species.

Chilika Lake

Odisha



K.R. Chandrasekhar

Date of Designation

October 1, 1981

Location

Puri, Khurda and Ganjam Districts

Area

1,16,500 hectares

Designation Criteria

2

Protection Status

15.5 km² island Nalabana designated as Bird Sanctuary

Wetland Type

Natural lagoon

Management Authority

Chilika Development Authority

Values and Benefits

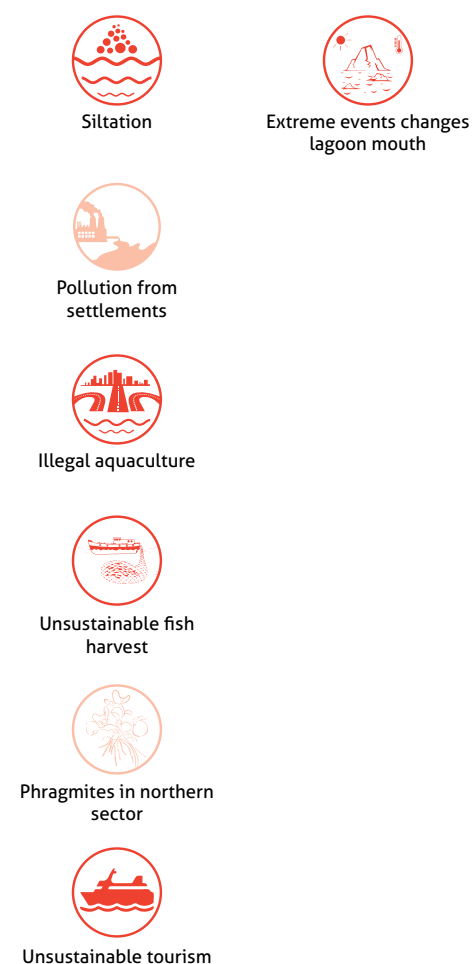
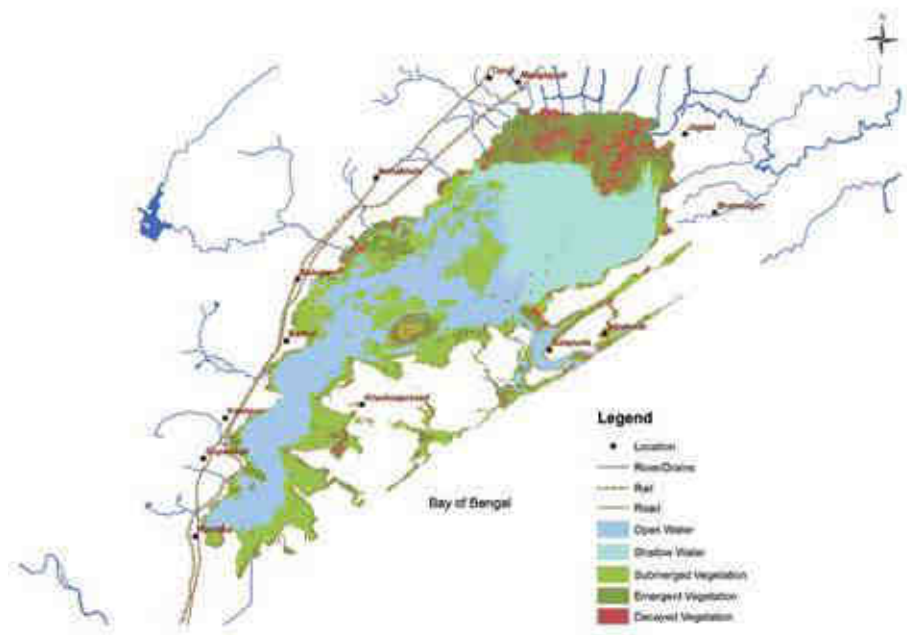
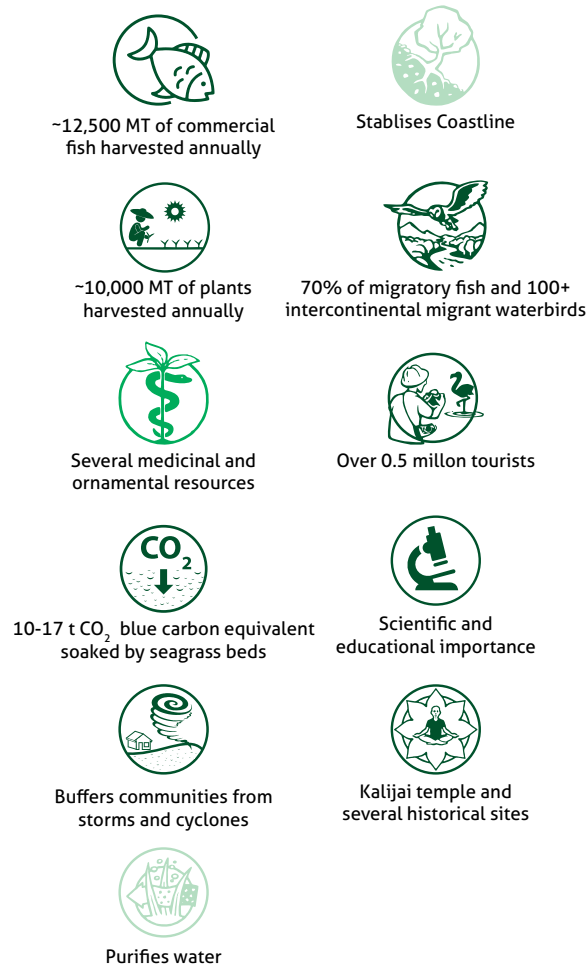
Significance

Low Medium High

Significance

Low Medium High

Threats



Species richness

225 Birds

300+ Fishes

18 Mammals

37 Reptiles & Amphibians

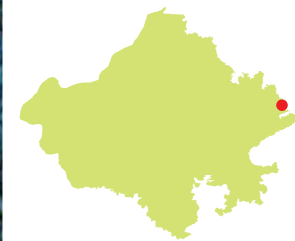
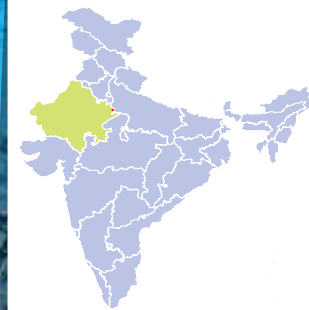
900+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Irrawaddy Dolphin	Scalloped Hammerhead, Smalltooth Sawfish, Ganges Shark	Irrawaddy Dolphin, Winghead Shark, Longhead Eagle Ray	Lesser White-fronted Goose, Indian Skimmer, Woolly-necked Stork, Great Knot, Common Pochard, Toli Shad, <i>Otolithes ruber</i>

Keoladeo National Park

Rajasthan



Dhritiman Mukherjee

Date of Designation

October 1, 1981

Location

Bharatpur District

Area

2,873 hectares

Designation Criteria

2

Protection Status

Keoladeo National Park

Wetland Type

Freshwater marsh and swamp

Other Designations

UNESCO World Heritage Site

Management Authority

Rajasthan Forest Department

Values and Benefits



Groundwater recharge



Habitat for several migratory species



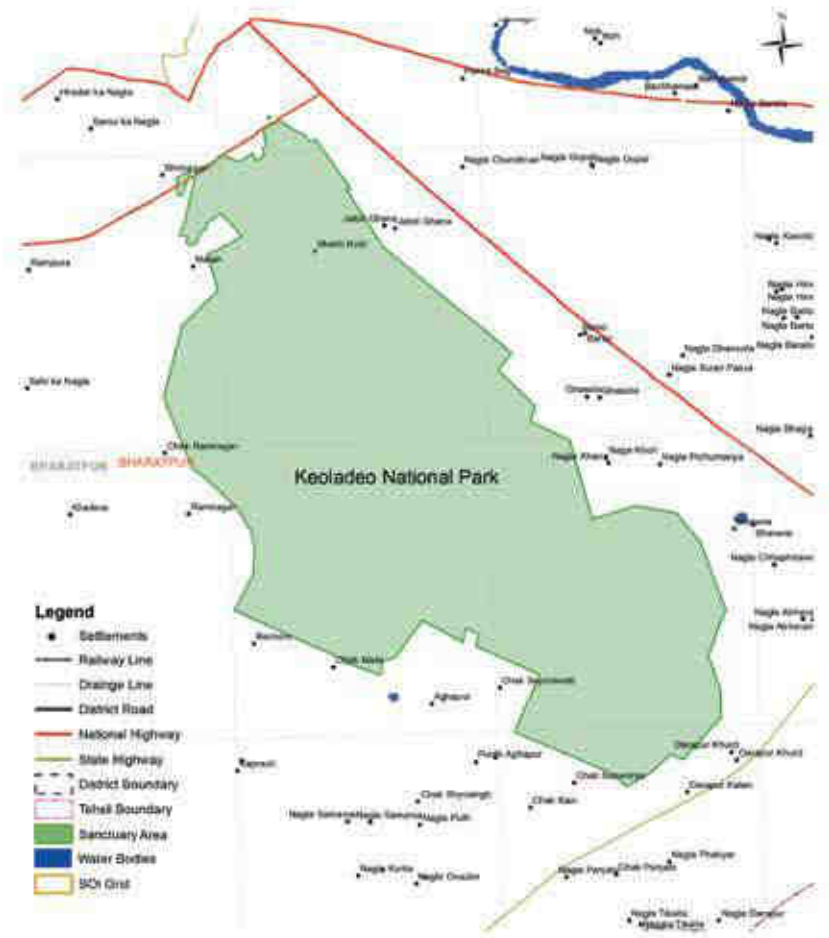
Tourism offers livelihood to local communities

Significance

Low Medium High

Significance

Low Medium High



Threats



Hydrological regime alteration



Encroachment



Invasive species proliferation like Water hyacinth, Knot grass, Mesquite and African catfish

Species richness

375 Birds

57 Fishes

34 Mammals

32 Amphibians and Reptiles

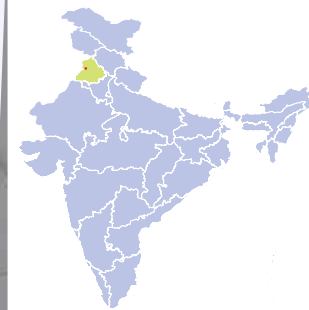
372 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus Crane, Greater spotted Eagle, Painted Stork, Hog Deer		Greater Adjutant, Hog Deer	Common Pochard, Woolly-necked Stork, Sarus Crane, Lesser Adjutant, Greater spotted Eagle, Smooth-coated Otter, Sambar

Harike Lake

Punjab



Wetlands International South Asia Photo Library

Date of Designation

March 23, 1990

Location

Tarn Taran, Kapurthala and Ferozepur Districts

Area

4100 hectares

Designation Criteria

1

Protection Status

Wildlife Sanctuary

Wetland Type

Reservoir and water storage area

Management Authority

Department of Forest and Wildlife Preservation, Punjab

Values and Benefits



Water for irrigation to southern Punjab and Rajasthan



Buffers flood



Purifies wastewater



Traps sediment



Recharges groundwater



Habitat for several migratory species



Recreation and tourism



Scientific and educational values



Cultural and spiritual importance

Significance

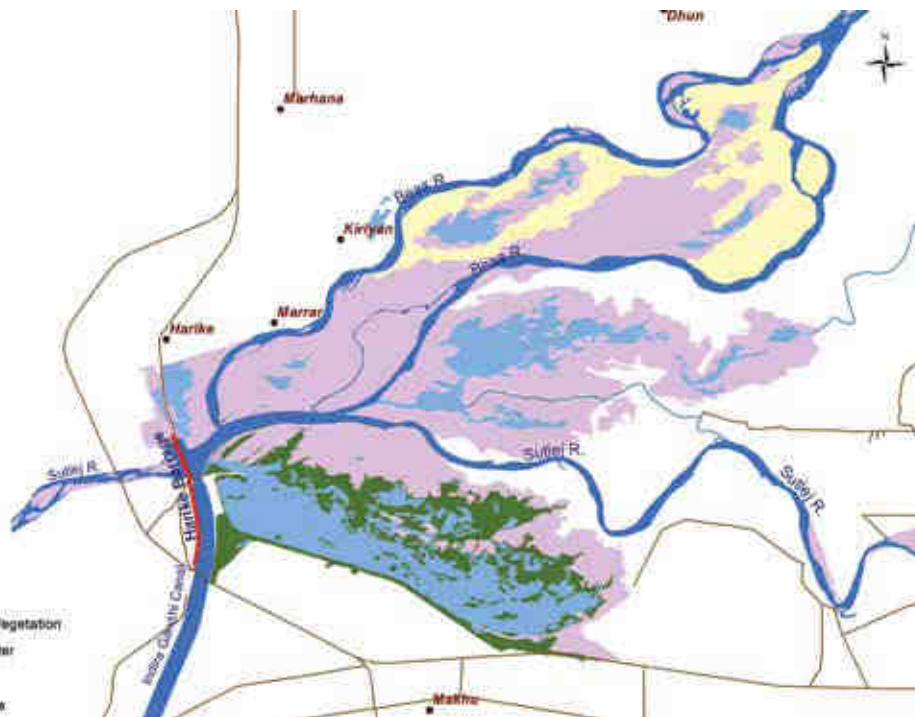
Low

Medium

High

Legend

- Location
- Road
- River
- Floating Vegetation
- Open Water
- Marsh
- Agriculture



Significance

Low

Medium

High

Threats



Siltation



Pollution from upstream cities and towns



Encroachment



Illegal fishing



Water hyacinth proliferation

Species richness

365 Birds

90 Fishes

13 Mammals

11 Reptiles

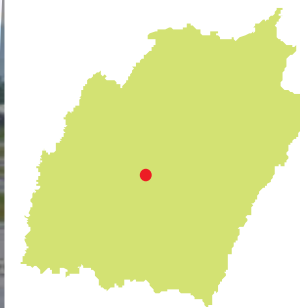
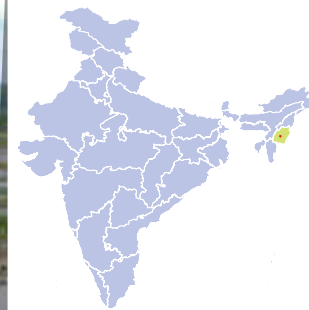
38 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Indus River Dolphin, Smooth Coated Otter	Gharial, Red-crowned Roofed Turtle	Indus River Dolphin, Black-Bellied Tern, Egyptian Vulture, Indian Narrow-headed Softshell Turtle	Smooth-coated Otter, Jerdon's Babbler, Lesser White fronted Goose, Eastern Imperial Eagle, Common Pochard, European Carp, Batchwa Vacha, Spotted Snow Trout

Loktak Lake

Manipur



Wetlands International South Asia Photo Library

Date of Designation

March 23, 1990

Location

Bishnupur District

Area

26,600 hectares

Designation Criteria

1,2

Wetland Type

Freshwater marsh

Protection Status

40 km² in southern part designated as Keibul Lamjao National Park
Wetland notified under Manipur Loktak Lake (Protection) Act, 2006

Management Authority

Loktak Development Authority

Values and Benefits



Source of drinking water



Purifies wastewater



Water for 105 MW hydropower



Groundwater recharge



Livelihood for 5,000 fishers



Lifecycle maintenance



Medicinal & ornamental plants



Tourism & recreation



Carbon sink



Scientific and educational importance



Protection from floods



Revered as Loktak Ima

Significance

Low

Medium

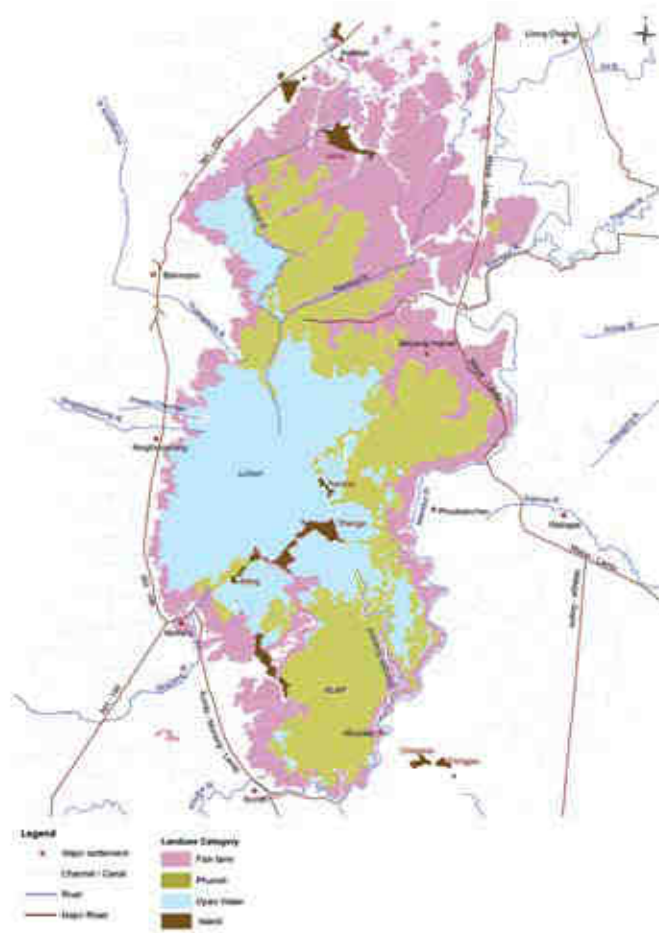
High

Significance

Low

Medium

High



Threats



Water regime alteration by Ithai barrage



Siltation



Pollution



Unsustainable water abstraction for hydropower



Spread of Phumdi



Fragmentation by roads

Species richness

116 Birds

54 Fishes

22 Mammals

68 Reptiles & Amphibians

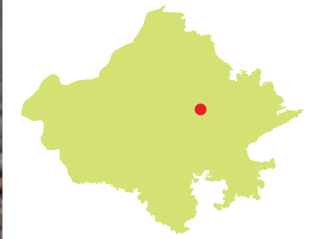
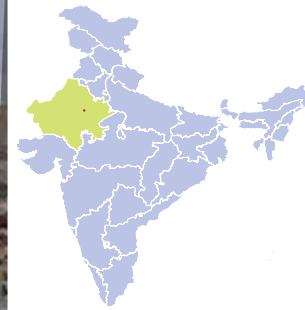
200+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Manipur Brow Antlered Deer or <i>Sangai</i>		Manipur Brow Antlered Deer, Hog Deer, Dhole, Red Jasper Barb, Keeled Box Turtle	Lesser Adjutant, Sarus Crane, Common Pochard, Hooded Crane, Common Carp, Amboina Box Turtle, King Cobra, Burmese Python

Sambhar Lake

Rajasthan



Wetlands International South Asia Photo Library

Date of Designation

March 23, 1990

Location

Jaipur, Nagaur and Ajmer
Districts

Area

24,000 hectares

Designation Criteria

1

Wetland Type

Natural saline lake

Management Authority

Rajasthan State Wetlands Authority

Values and Benefits



~5% of country's salt production



Lifecycle of migratory waterbirds



Tourism destination



Scientific and Educational values



Ancient temple of Shakambari Devi

Significance

Low

Medium

High

Significance

Low

Medium

High

Threats



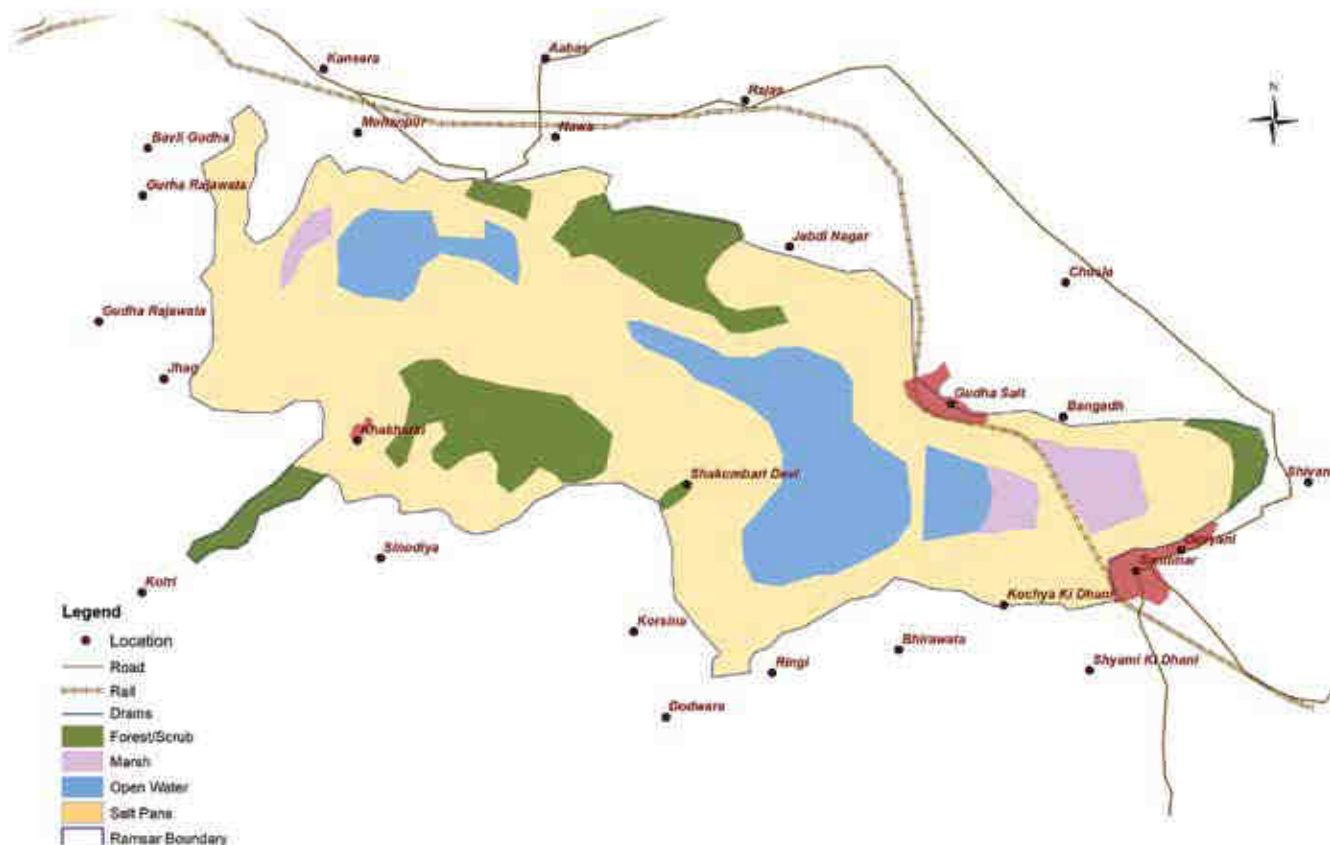
Hyper-salinity



Illegal salt mining



Regime fragmentation by roads and railways



Species richness

71 Birds

6 Mammals

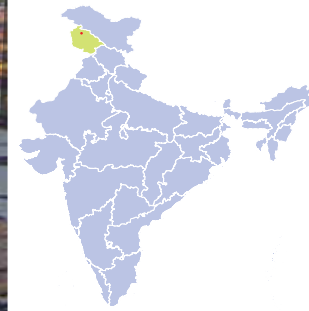
49 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Lesser and Greater Flamingo, Demoiselle Crane		Egyptian Vulture	Common Pochard

Wular Lake

Jammu and Kashmir



Wetlands International South Asia Photo Library

Date of Designation

March 23, 1990

Location

Bandipora District

Area

18900 hectares

Designation Criteria

1

Wetland Type

Freshwater lake and marsh

Management Authority

Wular Conservation and
Management Authority

Values and Benefits



~1500 MT fish catch annually



Spiritual and historical significance



Important source of vegetables for 30+ villages



Fodder



Buffers floods



Groundwater recharge



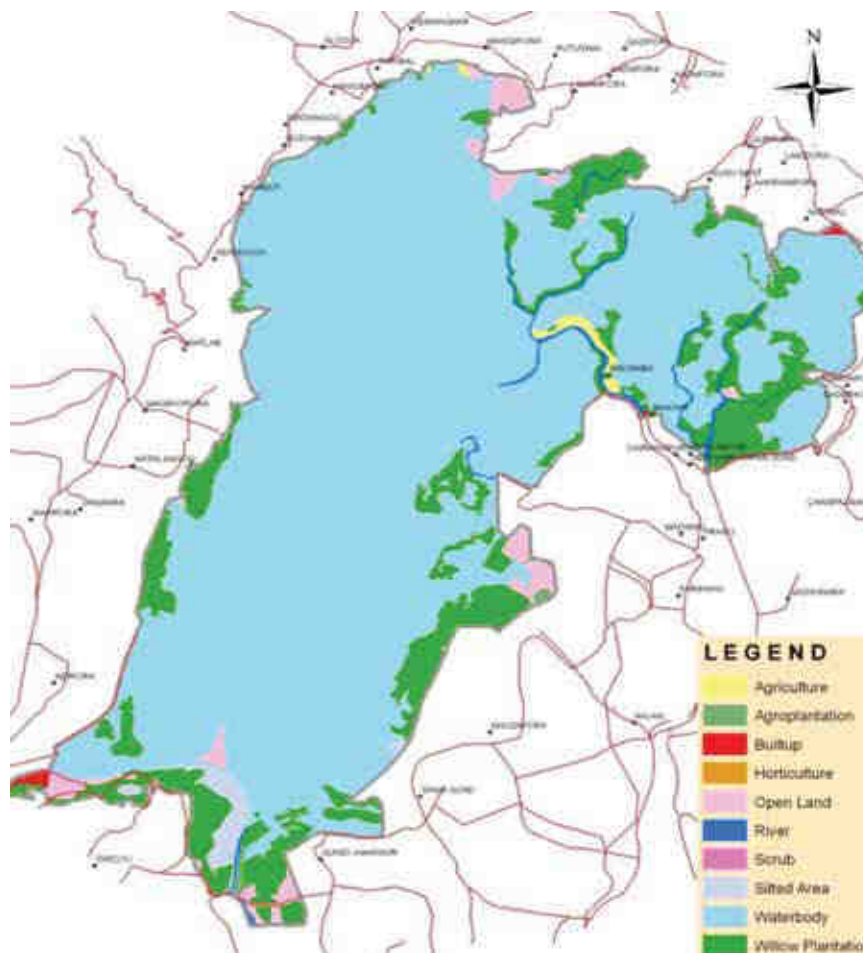
Tourism and recreation

Significance

Low Medium High

Significance

Low Medium High



Threats



Construction of embankments



Siltation



Pollution



Encroachment (Willow plantation)

Species richness

56 Birds

39 Fishes

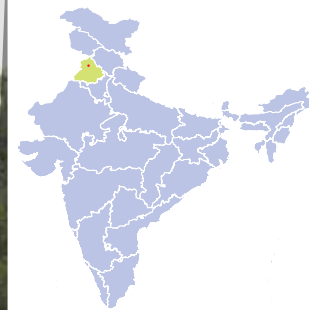
20+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
	White-bellied Heron, Pink-headed Duck, Baer's Pochard, Kashmir Catfish	Oriental Stork, White-headed Duck, White-winged Duck, Black-bellied Tern	Black-necked Crane, Indian Skimmer, Marbled Teal, Asla, Common Carp

Kanjli

Punjab



Wetlands International South Asia Photo Library

Date of Designation

January, 22, 2002

Location

Kapurthala District

Area

183 hectares

Designation Criteria

3

Protection Status

Conservation Reserve

Wetland Type

River stretch

Management Authority

Department of Forest and Wildlife
Preservation, Punjab

Values and Benefits



Provides water for irrigation



Recreation and tourism



Buffers floods



Scientific and educational values



Purifies wastewater



Holy river associated with Guru Nanak Dev ji



Traps sediment



Recharges groundwater



Habitat for several migratory species

Significance

Low

Medium

High

Significance

Low

Medium

High

Threats



Hydrological regime alteration



Siltation



Pollution from upstream cities and towns



Encroachment



Water hyacinth proliferation



Species richness

97 Birds

11 Fishes

4 Mammals

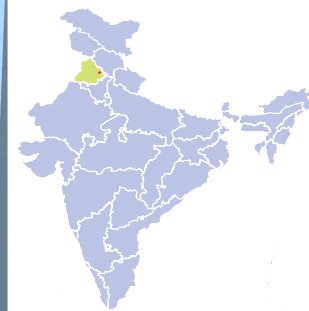
35 taxa of Invertebrates

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
<i>Utricularia sp.</i>			Common Pochard, Woolly-necked Stork, Common Carp, Wallagu Catfish

Ropar Lake

Punjab



Wetlands International South Asia Photo Library

Date of Designation

January 22, 2002

Location

Rupnagar and Nawanshahr
Districts

Area

1365 hectares

Designation Criteria

2,3

Protection Status

Conservation Reserve

Wetland Type

Barrage / Water storage area

Management Authority

Department of Forest and Wildlife
Preservation, Punjab

Values and Benefits



Source of drinking water, irrigation for lower Satluj Basin



Recreation and tourism adjoining historical site



Flood buffer



Scientific and educational values



Purifies wastewater



Traps sediment



Recharges groundwater



Habitat for several migratory species

Significance

Low

Medium

High

Significance

Low

Medium

High



Threats



Alteration in hydrological regimes



Siltation



Pollution from upstream cities and towns



Encroachment



Sand Mining

Species richness

318 Birds

35 Fishes

10 Mammals

22 Reptiles & Amphibians

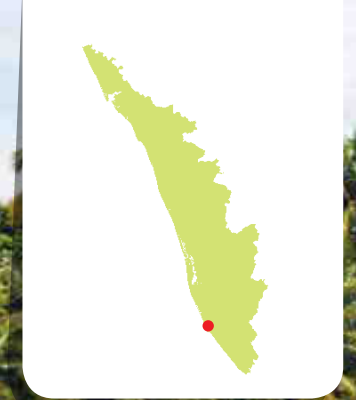
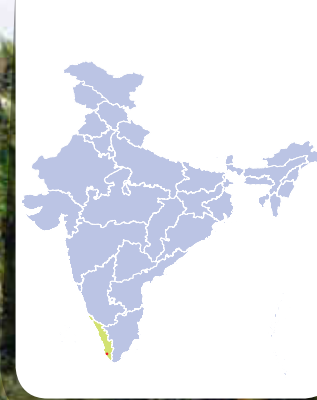
47 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Hog Deer, Indian Narrow-headed Softshell Turtle, Indian Pangolin			Common Pochard, Wolly-necked Stork, Mrigal Carp, Common Carp, Smooth Indian Otter, Sambar

Ashtamudi Wetland

Kerala



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Kollam District

Area

6140 hectares

Designation Criteria

1,2,3,8






Wetland Type

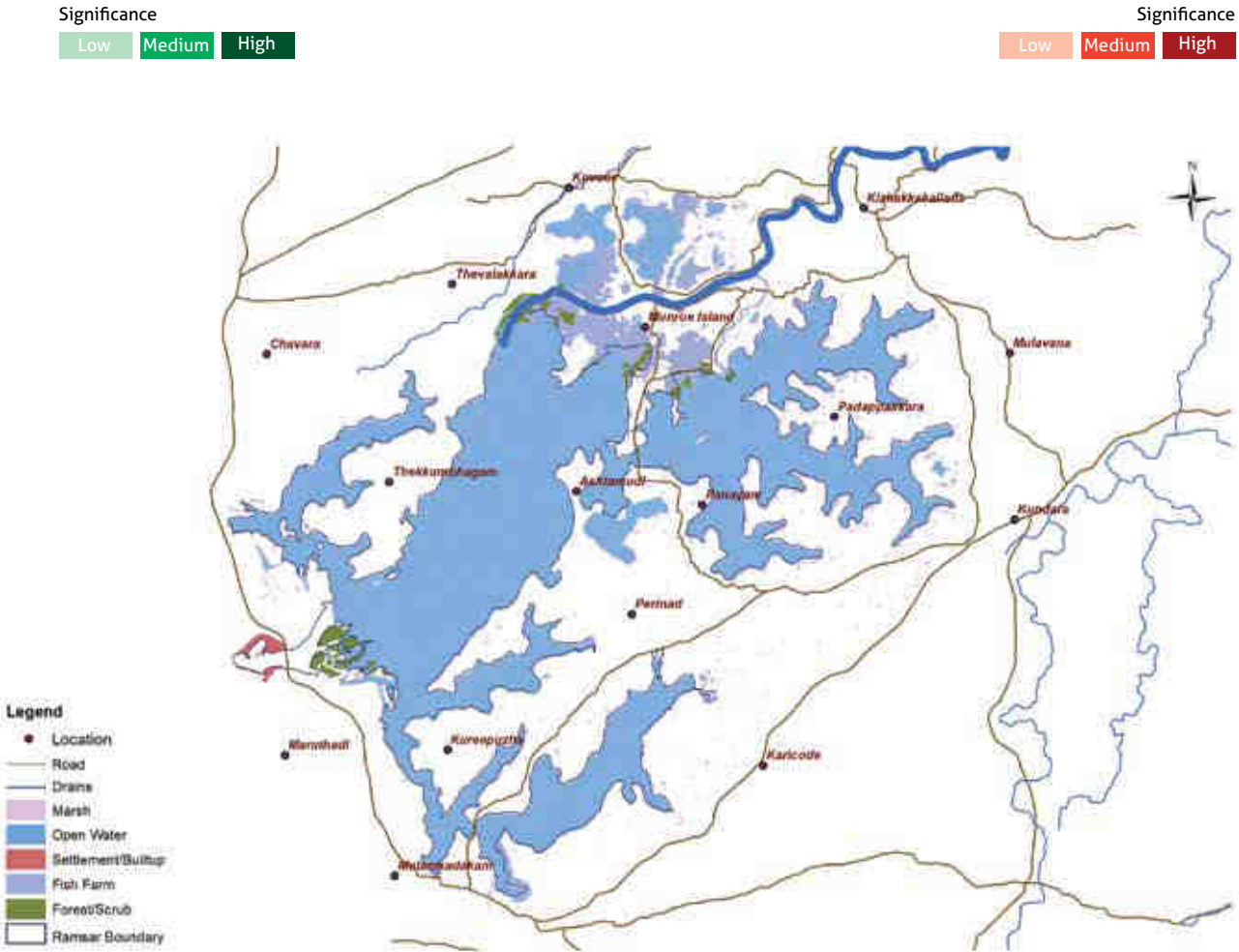
Estuary

Management Authority

State Wetland Authority Kerala

Values and Benefits

- 
Livelihood for 30,000 fishers
- 
Carbon sink
- 
Flood buffering
- 
Prevents shoreline erosion
- 
Habitat for migratory fish and water birds
- 
Part of famed cochin backwaters



Threats

- 
Freshwater flow reduction
- 
Salinization
- 
Silt deprivation
- 
Pollution
- 
Encroachment
- 
High pressure on fishing

Species richness

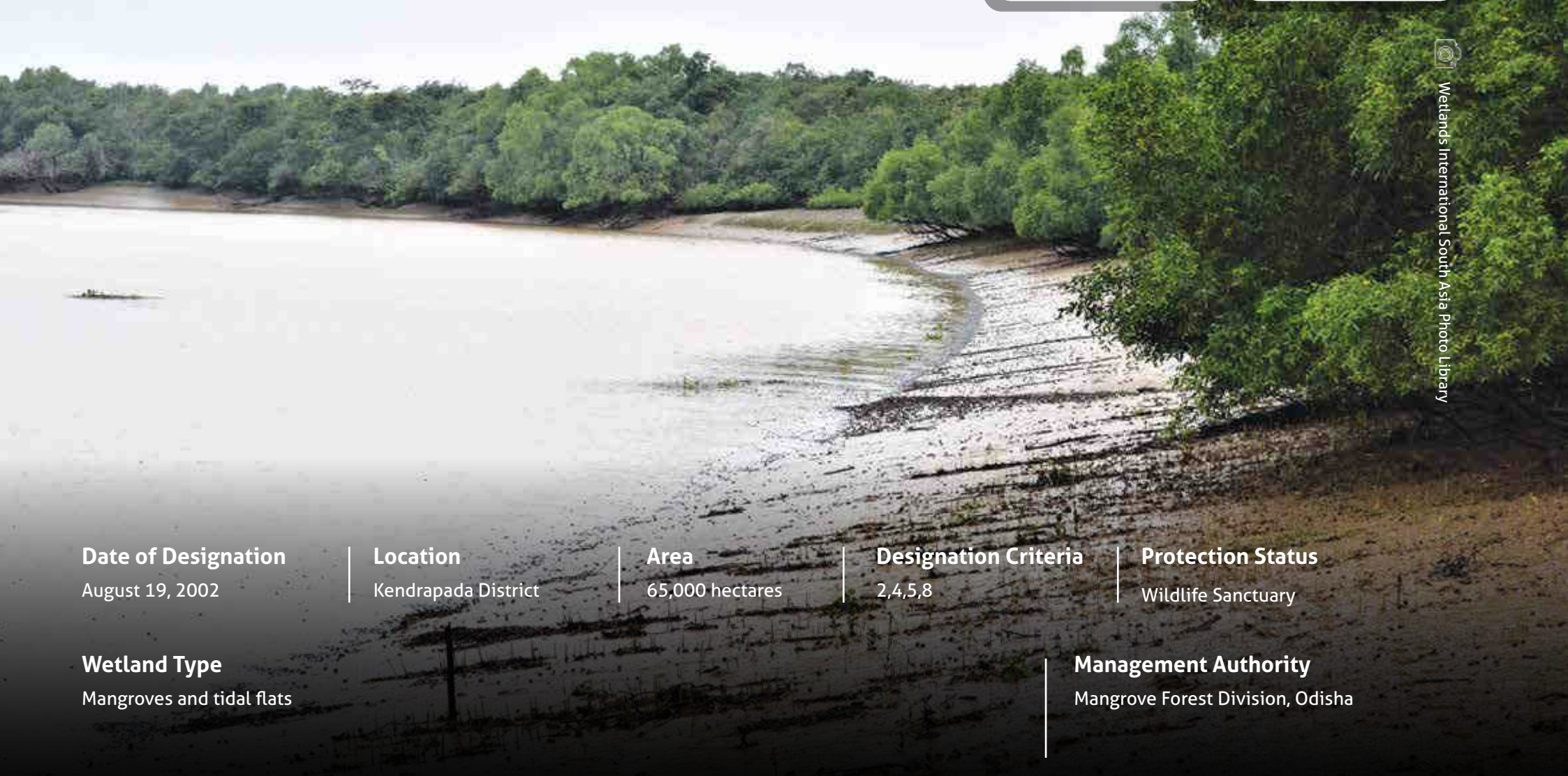
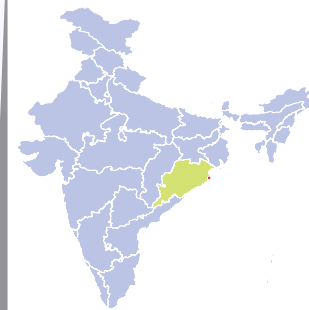
116 Birds
87 Fishes
115 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Pearlspot	<i>Syzygium travancoricum</i>		Günther's Catfish, Greater Spotted Eagle

Bhitarkanika Mangroves

Odisha



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Kendrapada District

Area

65,000 hectares

Designation Criteria

2,4,5,8

Protection Status

Wildlife Sanctuary

Wetland Type

Mangroves and tidal flats

Management Authority

Mangrove Forest Division, Odisha

Values and Benefits



Fisheries & Aquaculture
supports livelihoods
such as agriculture,
fishing and aquaculture



Buffers from cyclones
and tidal surges



Carbon sink



Prevents erosion



Ecotourism hotspot
60,000 tourists per year



Lifecycle maintenance
Nesting site for 0.5
million Olive Ridley
Turtles

1700+ Salt-water
crocodiles (highest
density of Saltwater
crocodiles in India)
60+ mangrove species



Scientific and
educational importance

Significance

Low

Medium

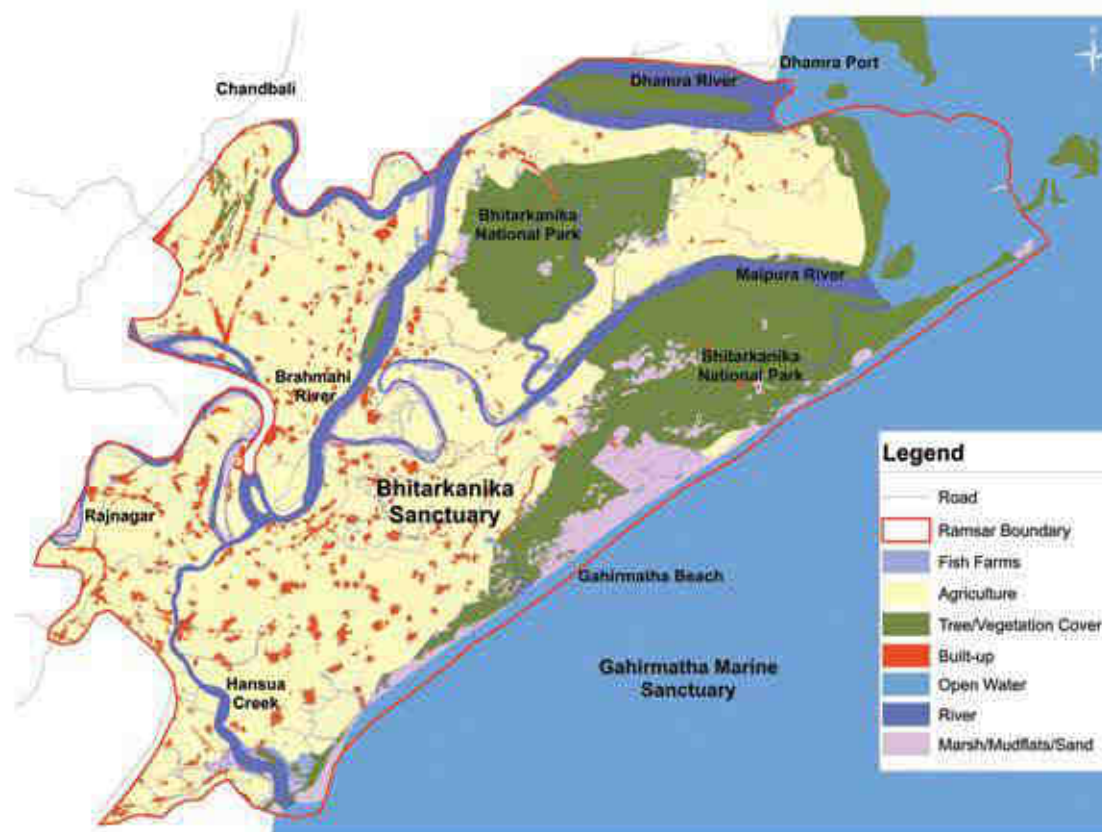
High

Significance

Low

Medium

High



Threats



Changes in freshwater
flow



Expansion of and effluents
from shrimp farms



Proposed expansion of Paradip
and Dhamra ports



High fishing pressure



Extreme events

Species richness

280 Birds

33 Fishes

24 Mammals

43 Reptiles & Amphibians

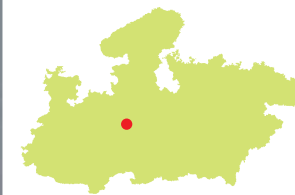
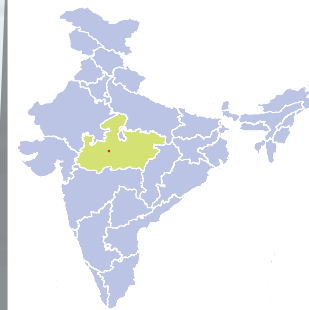
300+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Olive Ridley Sea Turtle, Salt-water Crocodile, <i>Avicennia sp.</i> and <i>Heritiera sp.</i>	Baer's Pochard, White-rumped Vulture	Irrawaddy Dolphin, Black-bellied Tern	Indo-Pacific Humpback Dolphin, Scrub Mahogany

Bhoj Wetland

Madhya Pradesh



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Bhopal District

Area

3201 hectares

Designation Criteria

1,2,3,5,8




Wetland Type

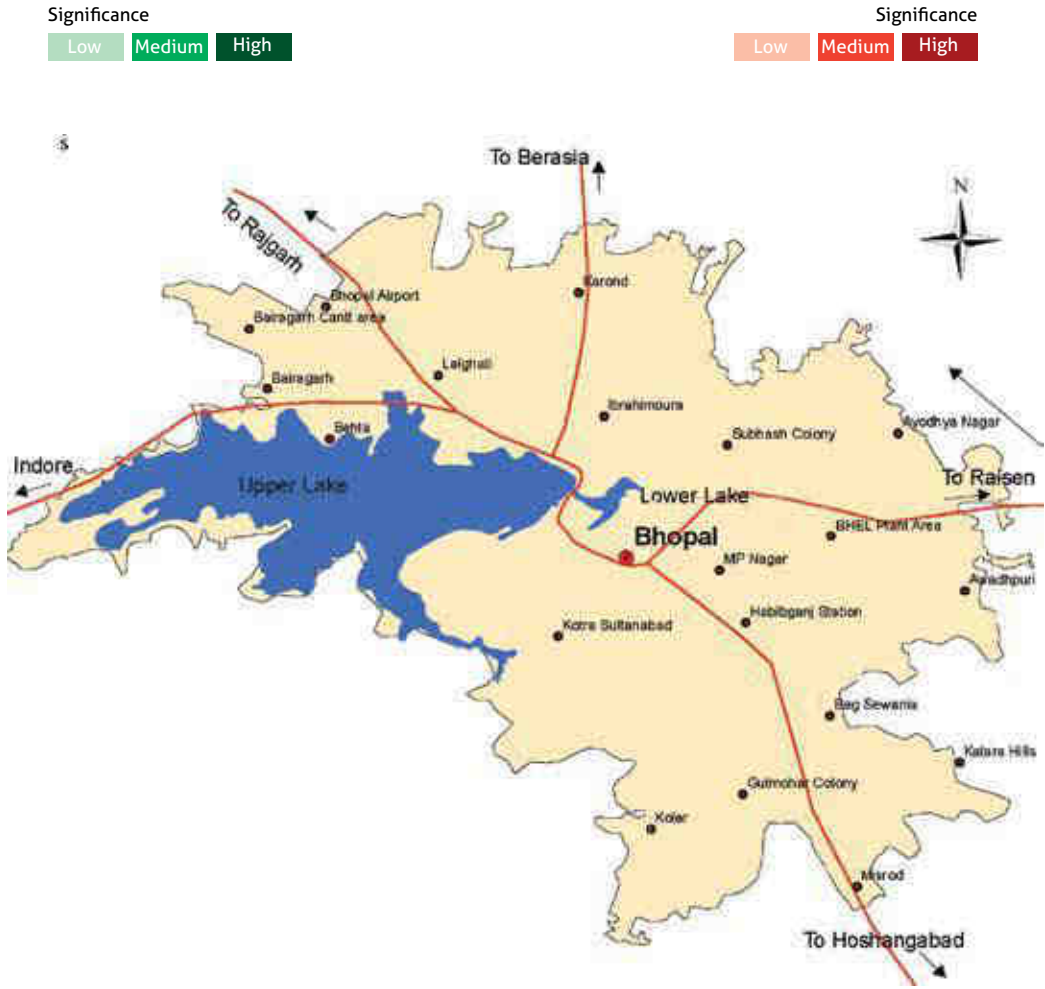
Reservoir

Management Authority

Bhopal Municipal Corporation

Values and Benefits

- 
Water source for capital city
- 
Livelihoods for 200+ fishers
- 
Buffers floods
- 
Recreation and tourism
- 
Scientific and educational value
- 
Cultural and spiritual importance



Threats

- 
Siltation
- 
Pollution
- 
Encroachment
- 
Invasive species

Species richness

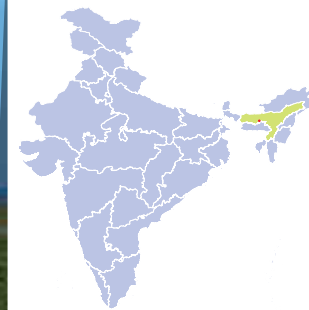
- 160+ Birds
- 43 Fishes
- 10+ Reptiles & Amphibians
- 106 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Red-crested Pochard		Egyptian Vulture	Sarus Crane, Wolly-necked Stork

Deepor Beel

Assam



Dhritiman Mukherjee

Date of Designation

August 19, 2002

Location

Kamrup District

Area

4000 hectares

Designation Criteria

1,2,4,7,8

Protection Status

Part of wetland notified as Wildlife Sanctuary

Wetland Type

River floodplain

Management Authority

Forest Department, Assam

Values and Benefits



Source of fresh water



Recreation and tourism



Support livelihoods of
500+ fishers



Cultural and spiritual
importance



Fodder



Medicinal and
ornamental resources



Flood buffer for
Guwahati city



Lifecycle maintenance of
migratory fish and birds

Significance

Low

Medium

High

Significance

Low

Medium

High

Threats



Hydrological regime
alteration



Pollution from sewage
and solid waste dumping



Encroachment



Invasive species



Regime fragmentation
by roads and railways



Species richness

219 Birds

50 Fishes

38 Reptiles & Amphibians

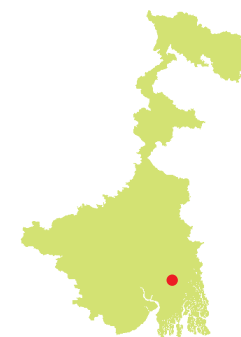
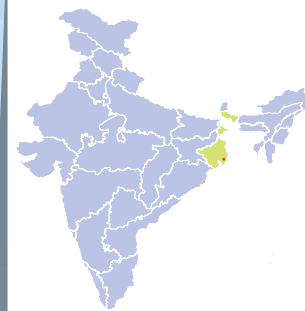
448 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Asian Elephant	Baer's Pochard	Greater Adjutant, Asian Elephant	Lesser Adjutant

East Calcutta Wetlands

West Bengal



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Kolkata District

Area

12,500 hectares

Designation Criteria

1

Protection Status

Protected under the East Kolkata Wetlands (Conservation and Management) Act, 2006

Wetland Type

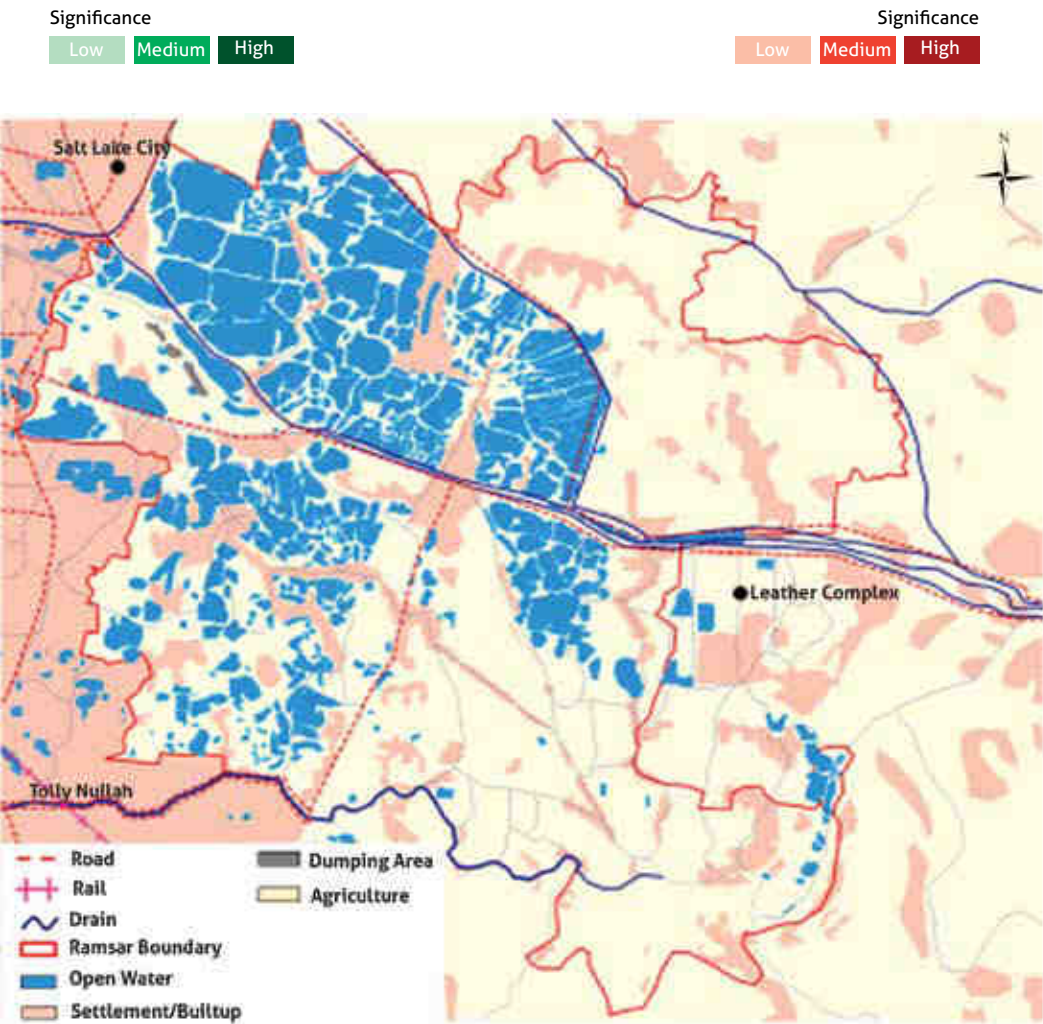
Aquaculture ponds and Wastewater treatment areas

Management Authority

East Kolkata Wetland Management Authority

Values and Benefits

- Livelihoods for 20,00 0+ families
- Largest assemblage of sewage fed fisheries
- Climate regulation
- Treats Kolkata city's sewage
- Recreation and tourism
- Recreation and tourism



Threats

- Siltation
- Pollution
- Encroachment

Species richness

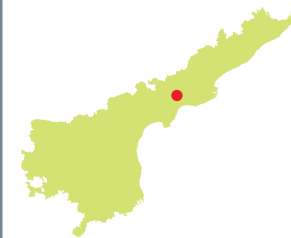
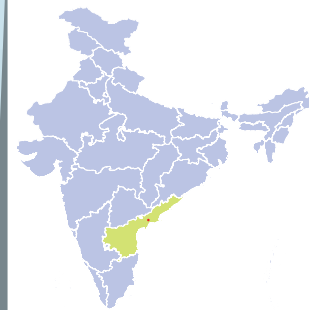
- 267 Birds
- 45 Fishes
- 20 Mammals
- 49 Reptiles & Amphibians
- 120 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Catla, Rohu, Common Water Monitor, Aztech Arrowhead	Bear's Pochard		Indian Spotted Eagle, Wood Snipe, Common Carp

Kolleru Lake

Andhra Pradesh



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Krishna and Godavari
District

Area

90100 hectares

Designation Criteria

1,2,4,5,8

Protection Status

Part designated as Wildlife Sanctuary

Wetland Type

Lakes, marsh and aquaculture ponds

Management Authority

Andhra Pradesh Forest Department

Values and Benefits

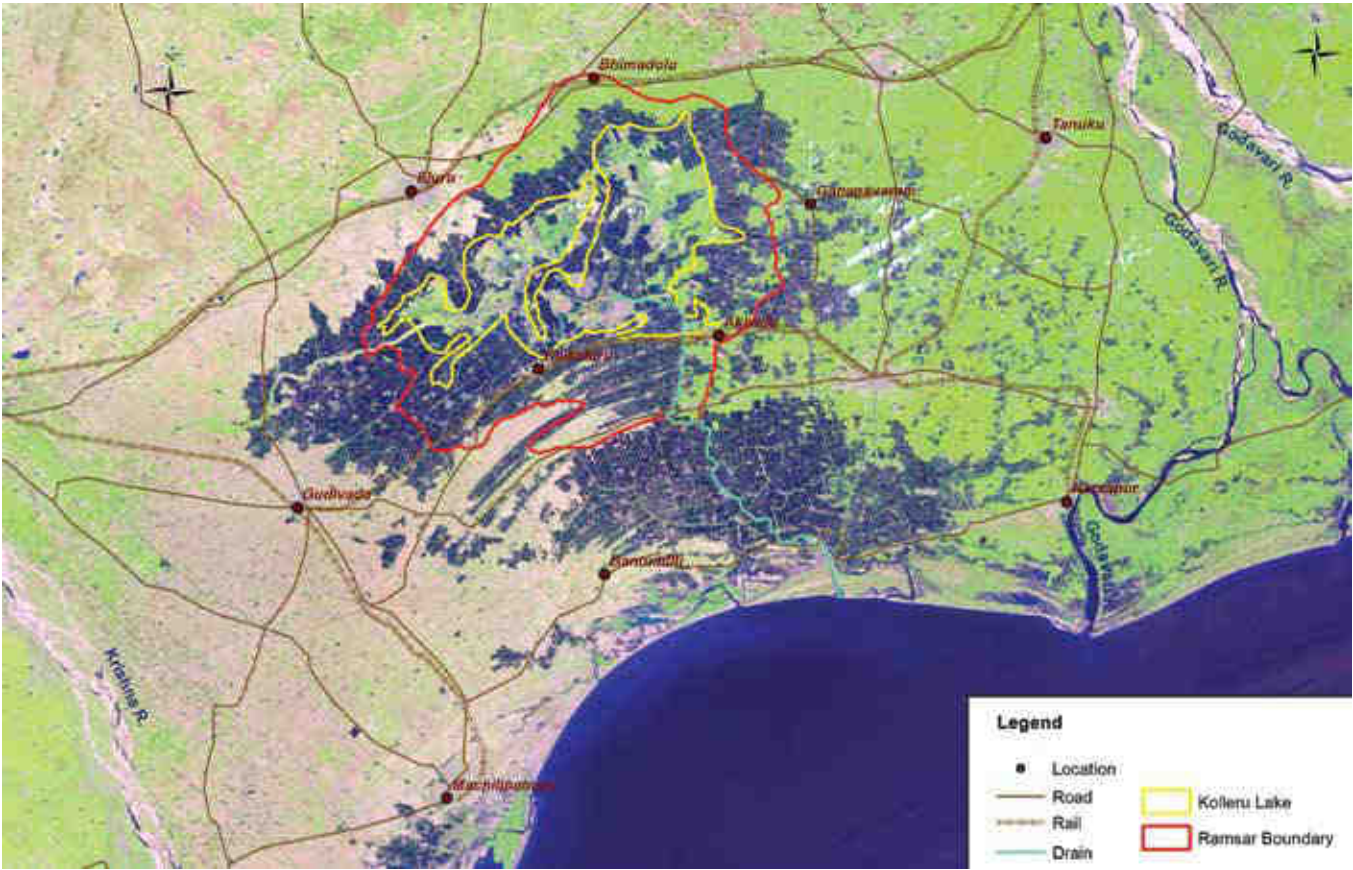
-  Fisheries
-  Buffers floods
-  Habitat for migratory species
-  Recreation and tourism
-  Spiritual and inspirational importance

Significance

Low

Medium

High









Significance

Low

Medium

High

Threats

-  Hydrological regime regulation
-  Siltation
-  Pollution
-  Aquaculture
-  Invasive species
-  Road network

Species richness

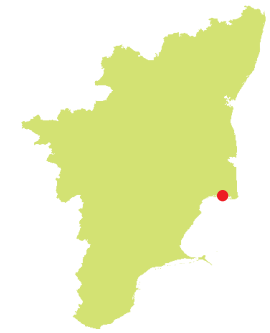
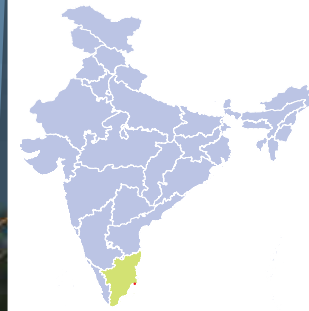
224 Birds
75 Fishes
34 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Spot-billed Pelican		Greater Adjutant	Grey Pelican, Lesser Adjutant

Point Calimere Wildlife and Bird Sanctuary

Tamil Nadu



S. Balachandran

Date of Designation

August 19, 2002

Location

Nagapattinam District

Area

38500 hectares

Designation Criteria

2,5,6,8

Protection Status

Part notified as Wildlife Sanctuary and Reserve Forest

Wetland Type

Mangrove swamps, lagoons, mud-flats, salt pans

Management Authority

Tamil Nadu Forest Department

Values and Benefits



~100 MT annual fish catch



Ecotourism hotspot



Nearly 40 km² under salt production



Scientific and educational importance



Blue Carbon Sink
120 km² of Muthupet mangrove wetland



Sites of historical importance such as Ramar Padam, Modi mandapam and Chola lighthouse



Wintering ground for waterbirds

Nesting site for olive Ridley Turtles

Largest Blackbuck population in Tamil Nadu

~200 species of medicinal plants

Significance

Low

Medium

High

Significance

Low

Medium

High



Threats



Salinisation



Siltation



Pollution from Settlements



Illegal aquaculture



Unsustainable fish harvest

Species richness

260 Birds

70 Fishes

14 Mammals

37 Reptiles & Amphibians

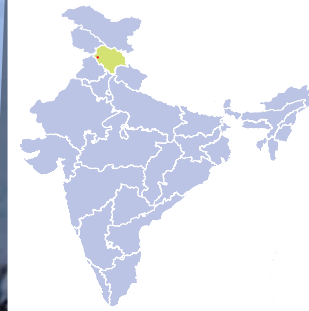
364 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Blackbuck, Spot-billed Pelican	Spoon-billed Sandpiper, Hawksbill Turtle	Green turtle	Star Tortoise, Olive Ridley Turtle

Pong Dam Lake

Himachal Pradesh



S. Balachandran

Date of Designation

August 19, 2002

Location

Kangra District

Area

15662 hectares

Designation Criteria

2,5,8

Protection Status

Wildlife Sanctuary

Wetland Type

Reservoir

Management Authority

Himachal Pradesh Forest Department

Values and Benefits



Irrigates 1.6 million ha agricultural land



Moderation of extreme events



Water for 396MW hydropower generation



Erosion prevention



~ 400 tonnes annual fish production
Livelihood for nearly 2700 fishers



Groundwater recharge



Lifecycle maintenance
Over 1 lakh migratory birds
One of the world's largest congregation of Bar-headed Geese



Tourism and Recreation



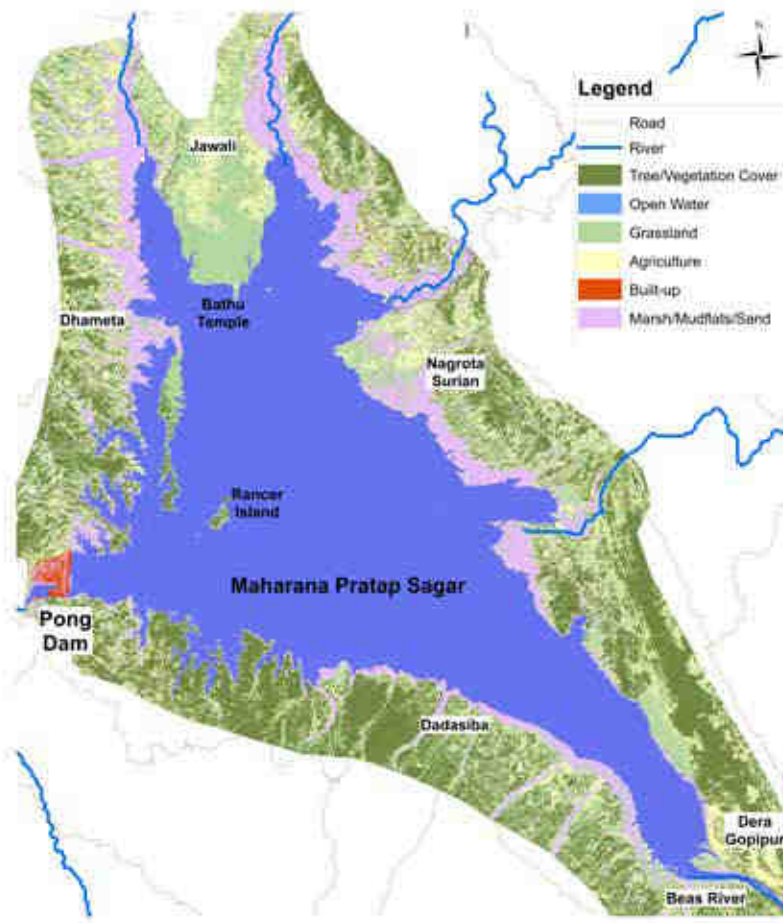
Scientific and educational importance



Cultural and spiritual importance

Significance

Low Medium High



Significance

Low Medium High

Threats



Hydrological regime alteration / Regime fragmentation



Siltation



Pollution



Unsustainable harvest of wetland resources



Over grazing



Extreme events

Species richness

400 Birds

27 Fishes

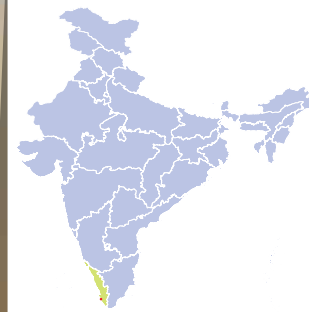
24 Mammals

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Bar-headed Goose	White-rumped Vulture	Black-bellied Tern, Mahaseer	Common Pochard, Woolly-necked Stork, Indian Softshell Turtle

Sasthamkotta Lake

Kerala



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Kollam District

Area

373 hectares

Designation Criteria

1,2,7,8

Wetland Type

Freshwater lake

Management Authority

State Wetland Authority Kerala

Values and Benefits



Water for Kollam city



Means of transport



Buffers flood



Groundwater recharge



Local tourism

Significance

Low

Medium

High

Significance

Low

Medium

High

Threats



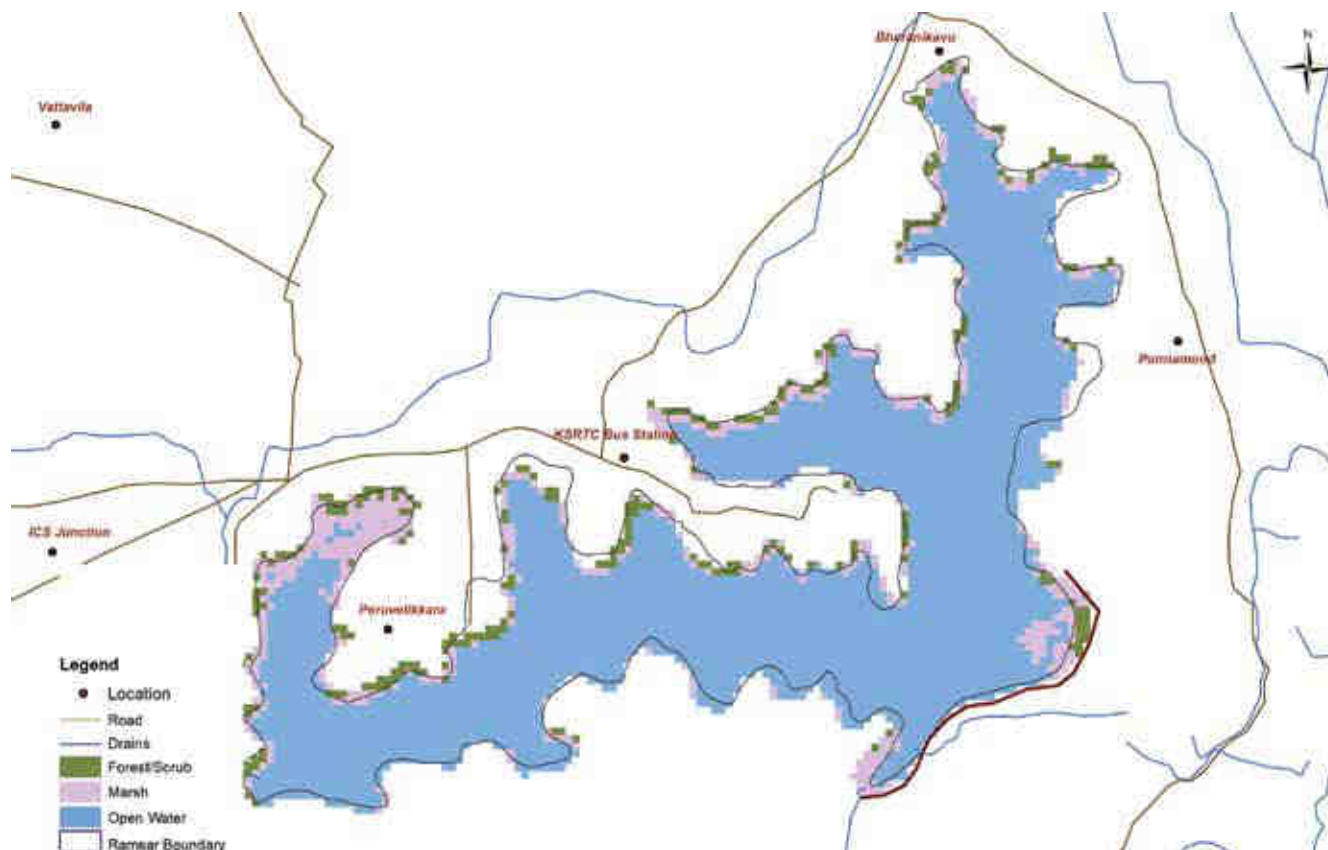
Pollution



Laterite mining



Over abstraction of water



Species richness

35 Waterbirds

37 Fishes

85 Plants

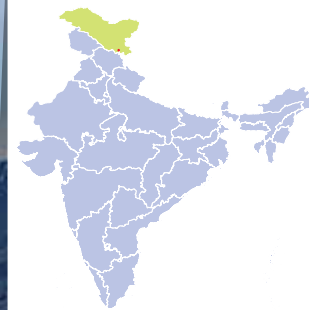
158 Plants and Trees

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Butter Catfish, Day's Glassy Perchlet, Malabar mystus			Gunther's catfish, Wallago Catfish

Tsomoriri

Ladakh



Dhritiman Mukherjee

Date of Designation

August 19, 2002

Location

Leh District

Area

12000 hectares

Designation Criteria

1,2,4

Protection Status

Conservation Reserve

Wetland Type

Brackish / Alkaline lake

Management Authority

Forest Department, Jammu & Kashmir

Values and Benefits



Fodder



Carbon sink



Buffers flood



Breeding ground for
migratory waterbirds



400-year-old Korzok Monastery
is a tourism destination



Scientific and
educational values

Significance

Low

Medium

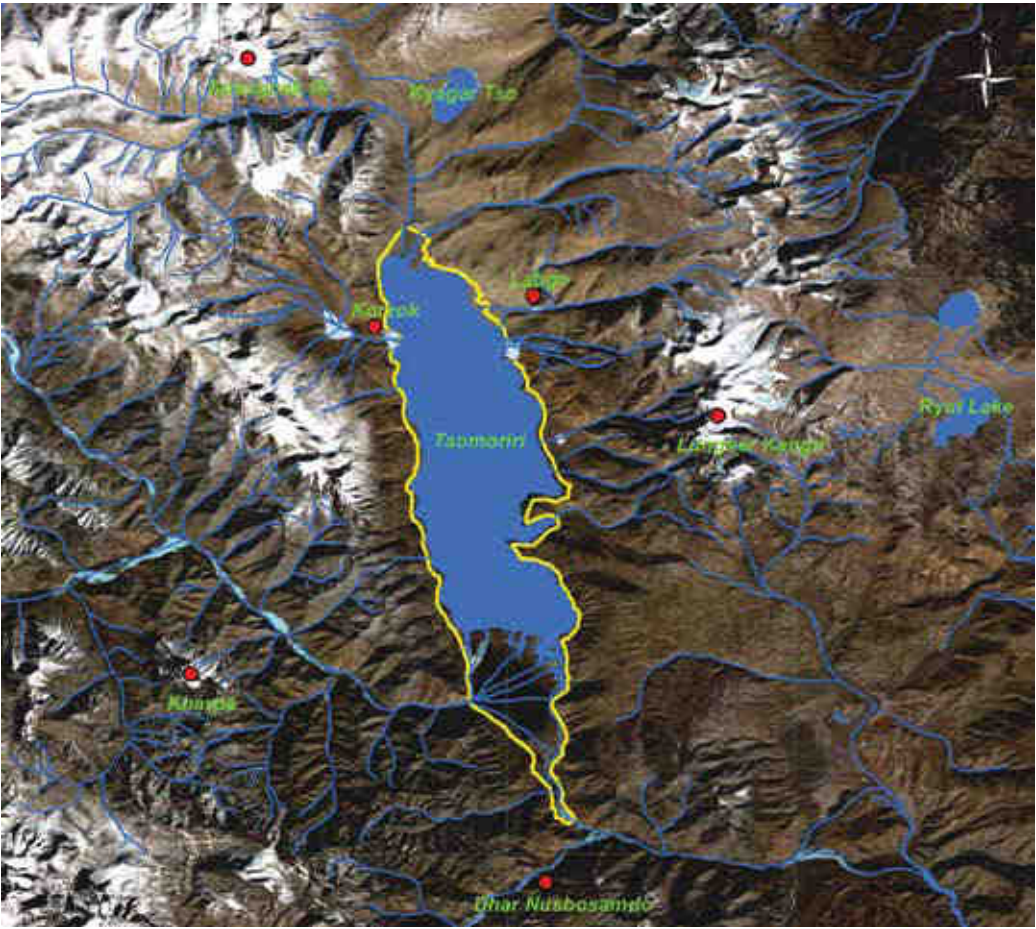
High

Significance

Low

Medium

High



Threats



Over grazing



Construction of roads



Tourism pressure

Species richness

11 Birds

8 Mammals

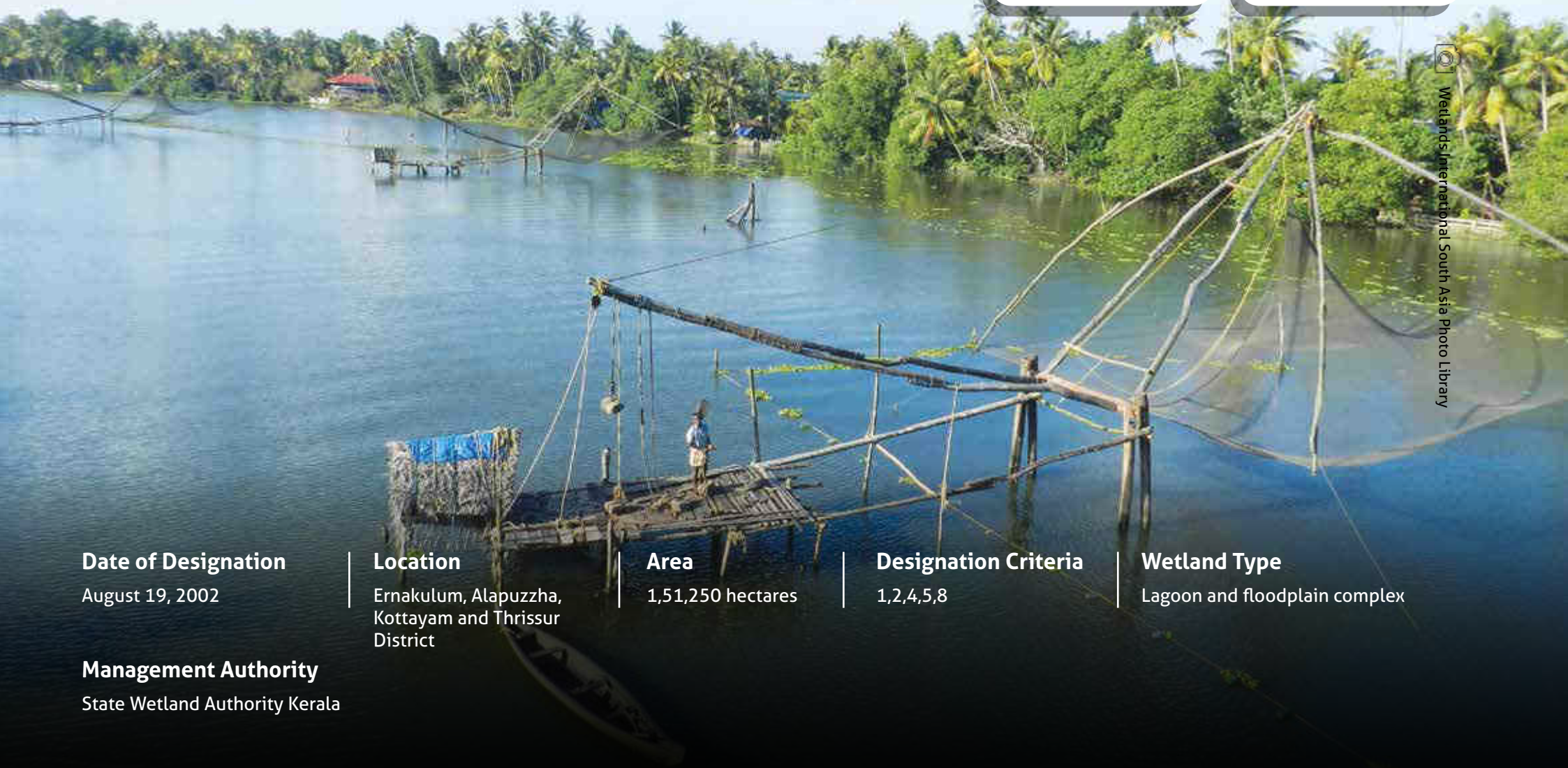
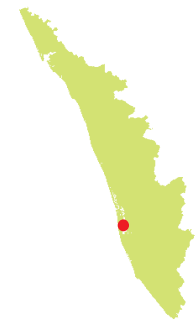
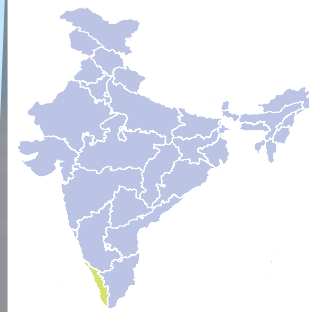
7 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Black-necked Crane			Common Pochard, Black-necked Crane

Vembanad-Kol Wetland

Kerala



Wetlands International South Asia Photo Library

Date of Designation

August 19, 2002

Location

Ernakulum, Alapuzha,
Kottayam and Thrissur
District

Area

1,51,250 hectares

Designation Criteria

1,2,4,5,8

Wetland Type

Lagoon and floodplain complex

Management Authority

State Wetland Authority Kerala

Values and Benefits



livelihoods for over 0.2 million households
Kuttanad: Rice bowl of Kerala



Flood buffer for Cochin and Ernakulam cities



Habitat for several migratory species



Backwater tourism



Scientific and educational values v



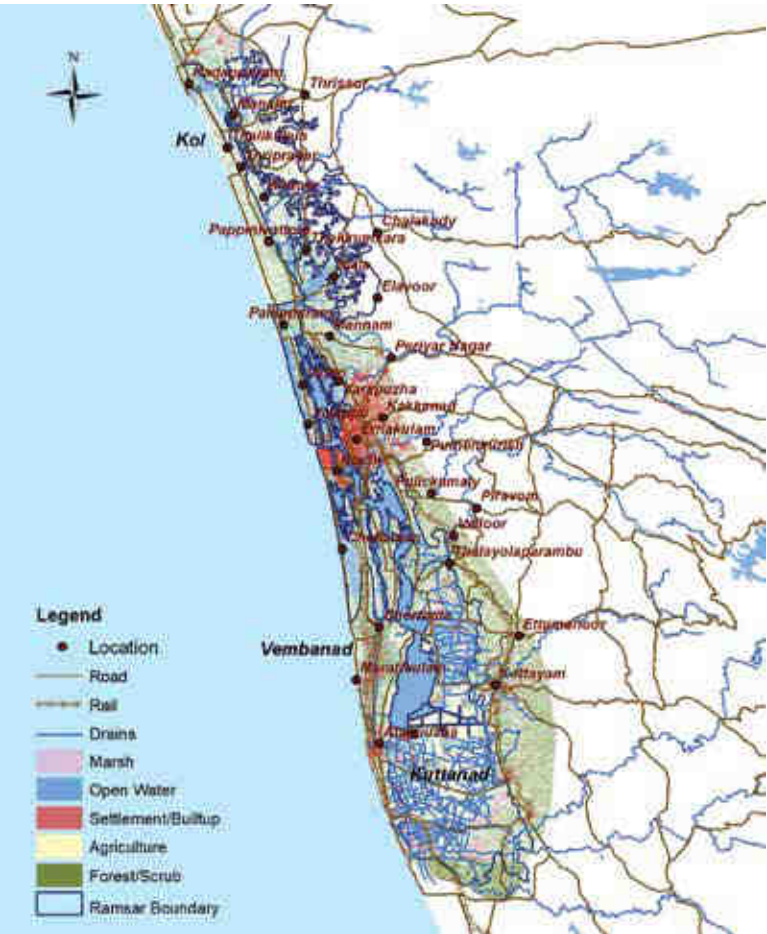
Cultural significance: Pokkali farming-geographical indication

Significance

Low Medium High

Significance

Low Medium High



Threats



Regulation by Thaneermukkom barrier



Pollution



Encroachment



Invasive species



Regime fragmentation



Tourism pressure

Species richness

225 Birds

102 Fishes

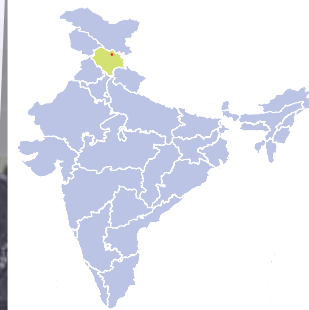
200+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Pearl Spot, Malabar mystus, Day's round herring		Steppe Eagle	Wooly-necked Stork, Gunther's catfish

Chandertal Wetland

Himachal Pradesh



Wetlands International South Asia Photo Library

Date of Designation

November 8, 2005

Location

Lahaul & Spiti District

Area

49 hectares

Designation Criteria

2,3

Protection Status

Wildlife Sanctuary

Wetland Type

Freshwater lake

Management Authority

Himachal Pradesh Forest Department

Values and Benefits



Source of freshwater



Lifecycle Maintenance



Medicinal plants



Tourism & recreation



Carbon storage in Peatlands



Scientific and educational importance



Buffers flash floods



Cultural and spiritual value



Erosion prevention



Recharges groundwater

Significance

Low

Medium

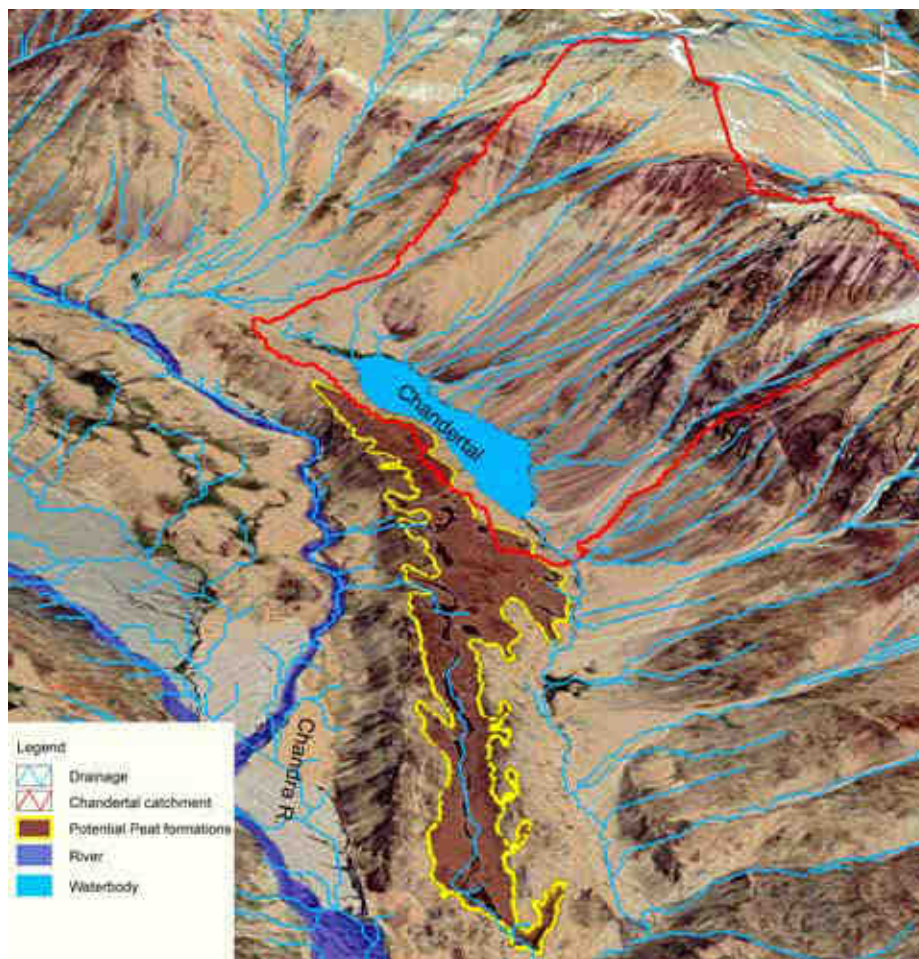
High

Significance

Low

Medium

High



Threats



Siltation



Solid water



Over Grazing



Unsustainable tourism



Climate Change

Species richness

26 Birds

11 Mammals

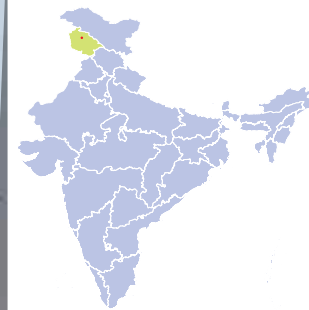
28 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Snow Leopard, Tibetan Wolf, Himalayan Ibex, Ruddy Shelduck			Snow Leopard

Hokera Wetland

Jammu and Kashmir



Wetlands International South Asia Photo Library

Date of Designation

November 8, 2005

Location

Budgam and Srinagar
Districts

Area

1375 hectares

Designation Criteria

2,4,5,8

Protection Status

Conservation Reserve

Wetland Type

Marshes

Management Authority

Department of Wildlife Protection,
Jammu & Kashmir

Values and Benefits



Water for agriculture



Scientific and educational value



Fisheries, supports livelihood for 30 villages,



Tourism and recreation



Ground water recharge,



Reeds, fibre and fodder



Flood protection



Water purification

Significance

Low Medium High

Significance

Low Medium High

Threats



Siltation



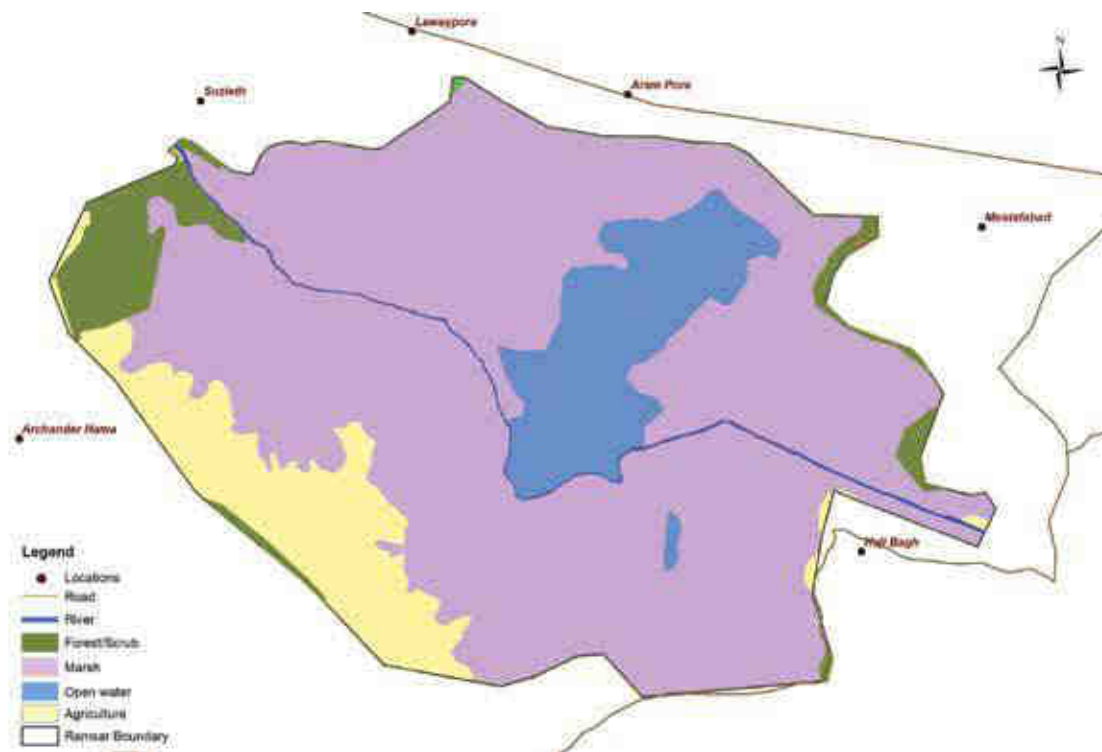
Pollution



Encroachment



Invasive species



Species richness

68 Birds

38 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Eurasian Otter, Schizothorax sp., Little Grebe		Pallas's Fish-Eagle	Common Carp, Common Pochard

Renuka Wetland

Himachal Pradesh



Wetlands International South Asia Photo Library

Date of Designation

November 8, 2005

Location

Sirmaur District

Area

20 hectares

Designation Criteria

3,4

Protection Status

Wildlife Sanctuary

Wetland Type

Freshwater lake and marshes

Management Authority

Himachal Pradesh Forest Department

Values and Benefits



Freshwater for domestic use and irrigation



Groundwater recharge



Moderation of extreme events



Lifecycle maintenance



Erosion prevention



Tourism and recreation



water purification



Scientific and educational importance



Cultural and spiritual importance

Sacred land based on the legend of Renuka ji and Lord Parshuram

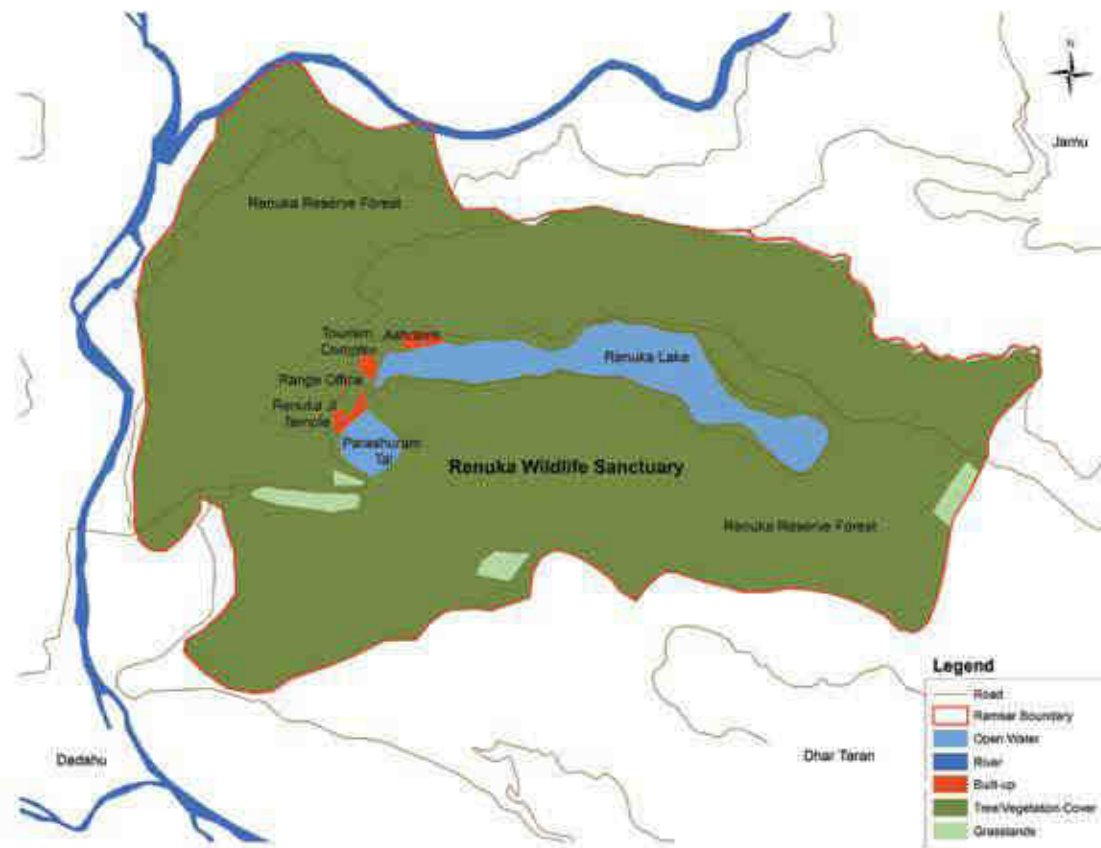
2-3 lakh pilgrims visit during annual 6-day Renuka ji fair

Significance

Low

Medium

High



Significance

Low

Medium

High

Threats



Siltation



Pollution



High tourism pressure

Species richness

103 Birds

19 Fishes

23 Amphibians & Reptiles

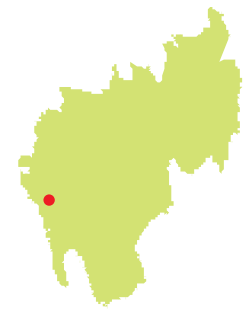
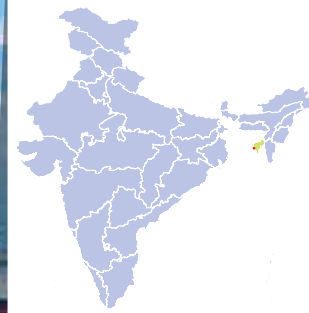
42 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Mahseer		Golden Mahseer	

Rudrasagar Lake

Tripura



Dhritiman Mukherjee

Date of Designation

November 8, 2005

Location

West Tripura District

Area

240 hectares

Designation Criteria

2,3,8

Wetland Type

Freshwater lake and marshes

Management Authority

Department of Fisheries, Government of Tripura

Values and Benefits



Freshwater for domestic use and irrigation



Source of fisheries



Provides medicinal and ornamental resources



Buffers floods



Neer mahal is a tourist attraction, having 3,00,000+ visitors annually



Cultural services valued at 33000 US dollars.

Significance

Low Medium High

Significance

Low Medium High

Threats



Hydrological regime alteration



Pollution/ disposal of urban sewage



Siltation



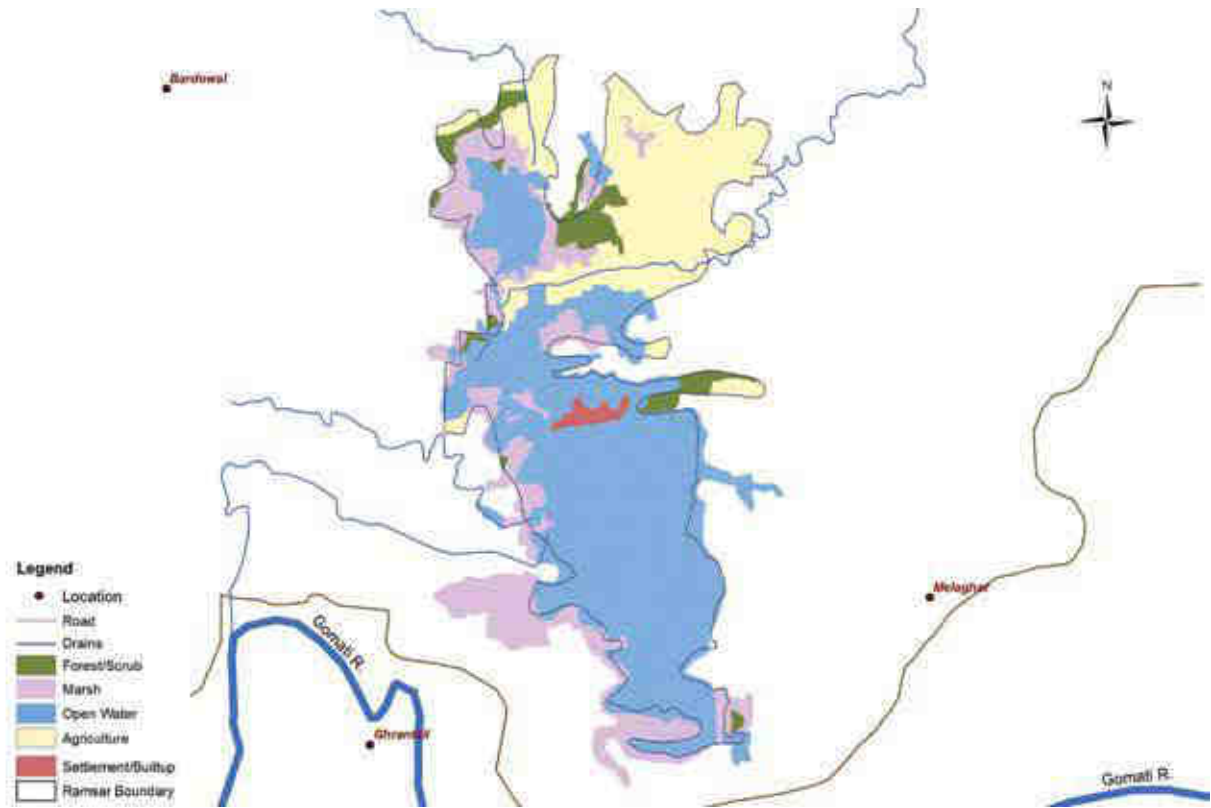
Encroachment



Invasive species



Regime fragmentation by roads



Species richness

50+ Fishes

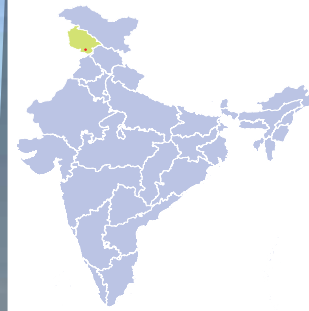
13 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
	Baer’s Pochard	Three striped Roof Turtle, Greater Adjutant	Common Pochard, Lesser Adjutant, Common Carp, Wallago Catfish

Surinsar-Mansar Lakes

Jammu and Kashmir



Pankaj Chandan

Date of Designation

November 8, 2005

Location

Udhampur District

Area

350 hectares

Designation Criteria

2,3,4

Protection Status

Wildlife Sanctuary

Wetland Type

Freshwater lakes

Management Authority

Surinsar-Mansar Development Authority

Values and Benefits



Water for agriculture



Recharges groundwater



Fodder for livestock



Buffers floods



Tourism and recreation



Religious tourism

Significance

Low Medium High

Significance

Low Medium High



Threats



Siltation



Pollution



Invasive species

Species richness

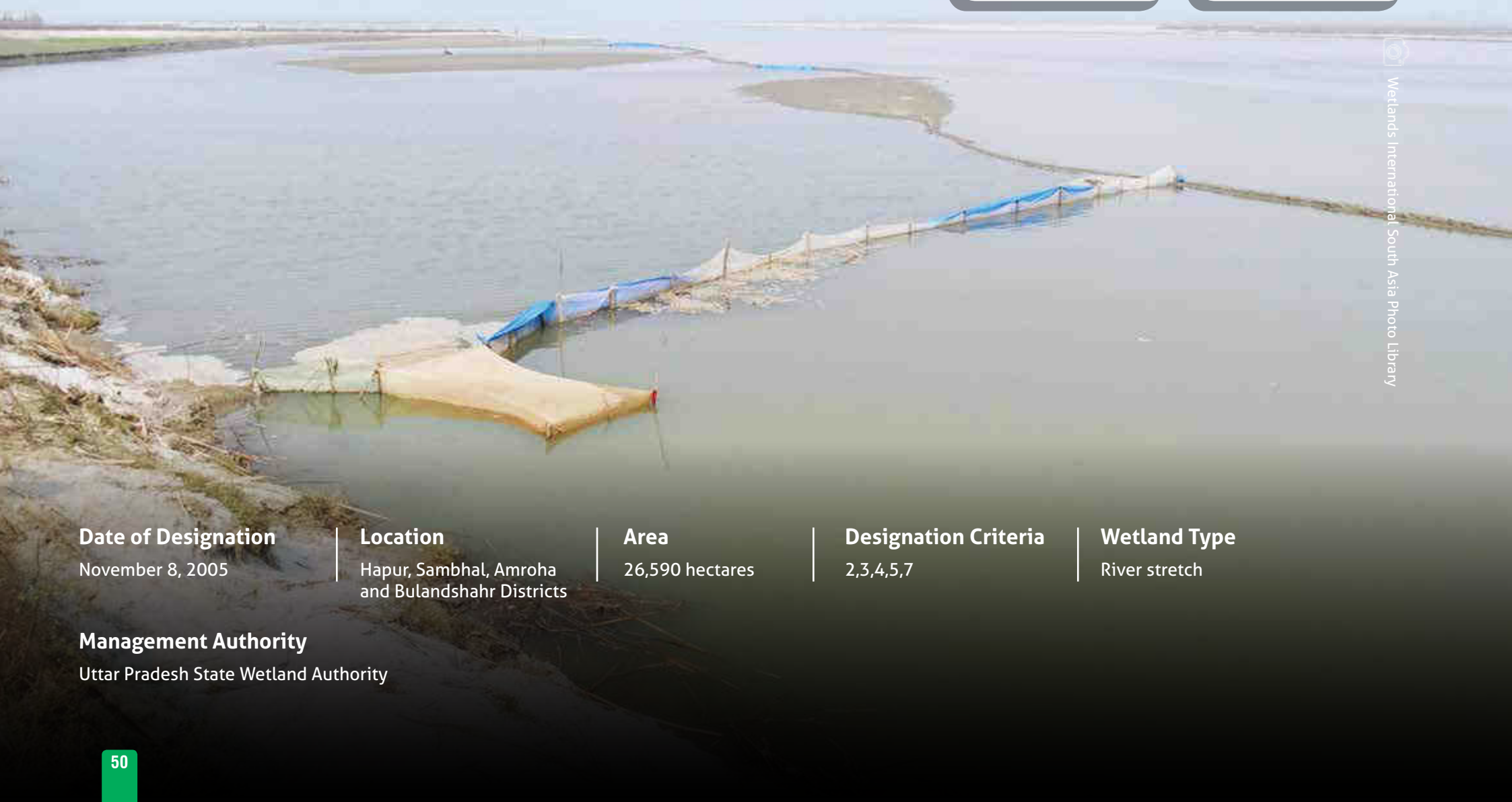
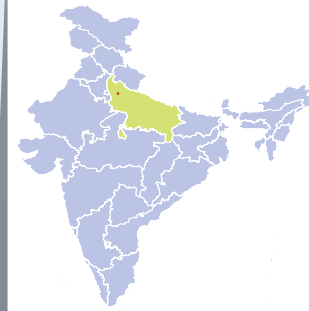
- 34 Birds
- 8 Fishes
- 8 Mammals
- 2+ Reptiles & Amphibians
- 28 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Indian Flapshell Turtle			Common Pochard, Indian Softshell Turtle, Common Carp

Upper Ganga River

Uttar Pradesh



Wetlands International South Asia Photo Library

Date of Designation

November 8, 2005

Location

Hapur, Sambhal, Amroha
and Bulandshahr Districts

Area

26,590 hectares

Designation Criteria

2,3,4,5,7

Wetland Type

River stretch

Management Authority

Uttar Pradesh State Wetland Authority

Values and Benefits



Provides water for irrigation



Tourism and recreation



Support fisheries



Bathing ghats having religious value namely Brijghat, Anoopshahr ghat and Rajghat



Buffers flood



Traps sediment and water purification



Recharges groundwater



Habitat for migratory species

Significance

Low

Medium

High



Significance

Low

Medium

High

Threats



Hydrological regime alteration



Spread of invasive species



Siltation



Tourism pressure



Encroachment



Pollution due to agricultural runoff



High pressure on wetland resources



Mining

Species richness

100+ Birds

82 Fish

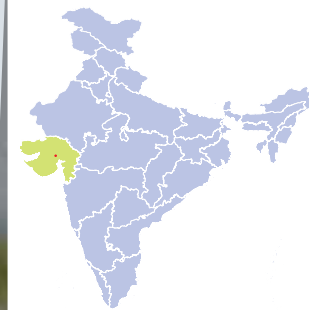
12 Turtles

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Gangetic Dolphin	Gharial, White-rumped Vulture, Red-crowned Roofed Turtle	Pallas's Fish-eagle, Gangetic Dolphin	Wolly-necked Stork

Nalsarovar

Gujarat



Wetlands International South Asia Photo Library

Date of Designation

September 24, 2012

Location

Surendranagar and
Ahemdabad Districts

Area

12000 hectares

Designation Criteria

1,2,3,4,5,6

Protection Status

Bird Sanctuary

Wetland Type

Marsh

Management Authority

Forest Department, Gujarat

Values and Benefits



Support livelihood of
40,000+ fishers



Cultural and spiritual
importance



Provides food & fodder



Support several grass
species



Maintains hydrological
regime



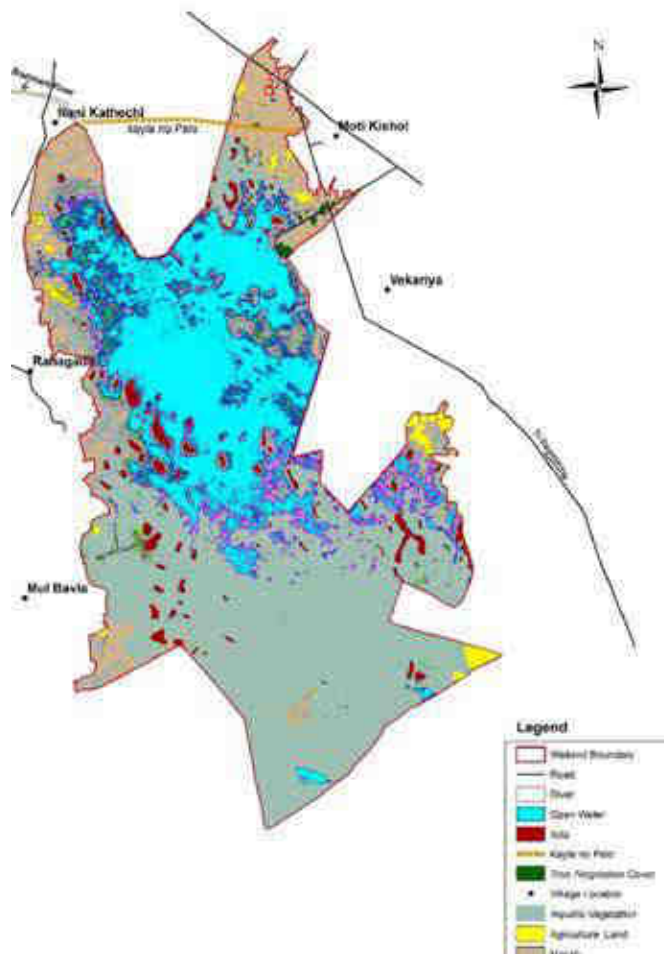
Supports large congregation of
waterbirds



Attracts 70,000+ visitors
annually

Significance

Low Medium High



Significance

Low Medium High

Threats



Pollution



Poaching, high pressure
on resources



Unsustainable tourism

Species richness

250 Birds

20 Fishes

13 Mammals

11 Ambhíbians & Reptiles

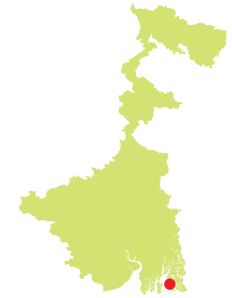
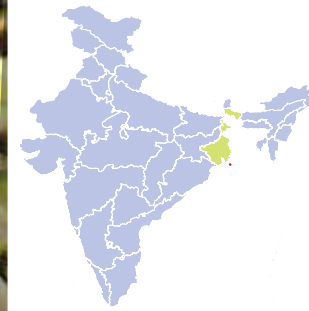
153 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Greater Flamingo, Dalmatian Pelican	Sociable Lapwing, Red- headed Vulture, White- rumped Vulture	Indian Wild Ass, Spotted Greenshank, Lesser Florican, Black-bellied Tern, Pallas's Fish Eagle	Eastern Imperial Eagle

Sundarban Wetland

West Bengal



David V. Raju

Date of Designation

January 30, 2019

Location

24 Parganas District

Area

423000 hectares

Designation Criteria

2,3,7,8

Protection Status

National Park

Wetland Type

Mangrove swamps, mud flats, lagoons

Other designations

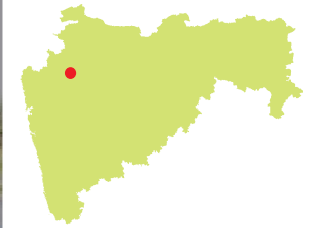
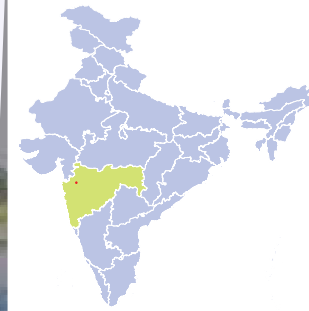
UNESCO World Heritage Site
UNESCO Biosphere Reserve

Management Authority

West Bengal Forest Department

Nandur Madhameshwar

Maharashtra



Bharat Baburao Shinde

Date of Designation

June 21, 2019

Location

Nashik District

Area

1437 hectares

Designation Criteria

2,3,4,5,6,7,8

Protection Status

Wildlife Sanctuary

Wetland Type

Barrage & water storage area

Management Authority

Maharashtra Forest Department (Wildlife Wing)

Values and Benefits



Provides water for domestic use and irrigation



Lifecycle maintenance of Migratory fish and water bird



Micro-climate regulation



Site for tourism and recreation



Flood control



Scientific and educational value



Water Purification



Madhmeshwar temple is a pilgrimage site



Prevention of erosion



Ground water recharge

Significance

Low

Medium

High



Significance

Low

Medium

High

Threats



Hydrological regime alteration



Unsustainable tourism



Pollution



Unsustainable fish harvest



Regime fragmentation



Over-grazing



Unsustainable water abstraction



Invasive species

Species richness

256 Birds

8 Fishes

8 Mammals

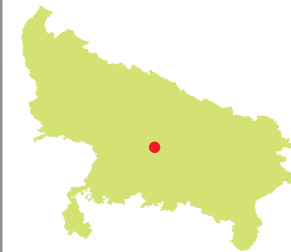
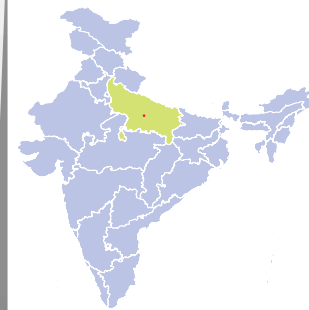
536 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Butter Catfish	White-rumped Vulture, Indian Vulture, Deolali Minnow	Egyptian Vulture, Kooral	Common Pochard, Bristled Grassbird, Woolly-necked Stork, Shalyni Barb

Nawabganj Bird Sanctuary

Uttar Pradesh



Uttar Pradesh State Wetlands Authority

Date of Designation

September 19, 2019

Location

Unnao District

Area

224.6 hectares

Designation Criteria

2,3,4,5,6

Protection Status

Bird Sanctuary

Wetland Type

Marsh

Management Authority

Uttar Pradesh State Wetland Authority

Values and Benefits



Buffer floods



Groundwater recharge



Habitat for migratory water birds



Tourism and recreation



Scientific and educational values

Significance

Low

Medium

High

Significance

Low

Medium

High

Threats



Canalization



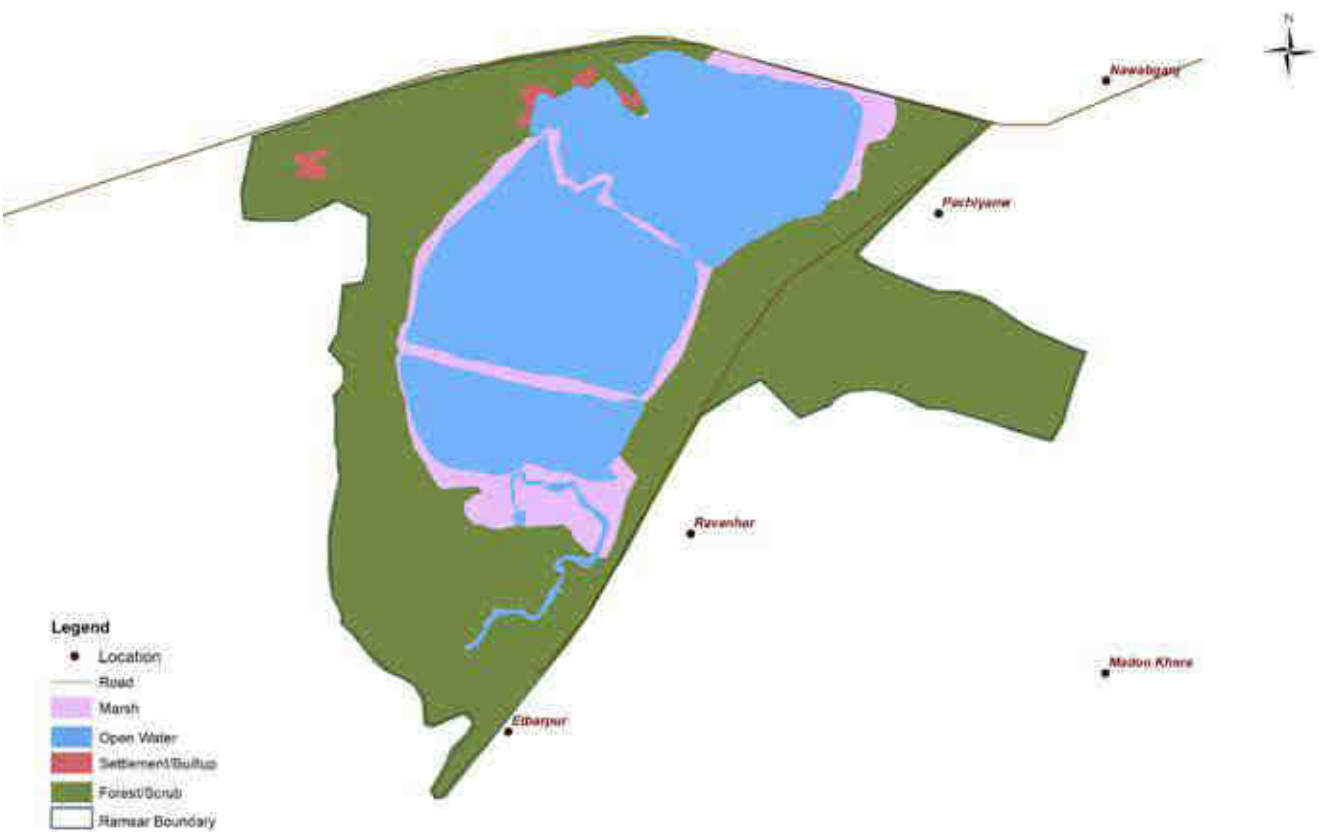
Siltation



Pollution



Invasive species



Species richness

220 Birds

20 Fishes

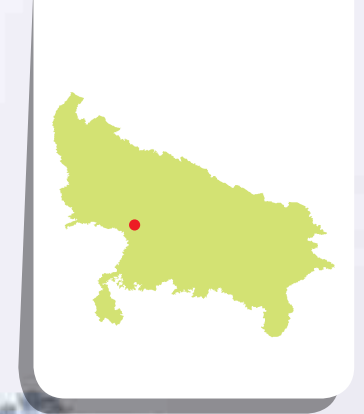
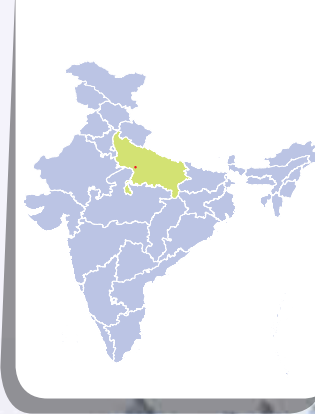
200 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
		Palla's fish eagle, Egyptian Vulture	Greater Spotted Eagle, Common Pochard, Woolly necked stork, Lesser Adjutant

Sarsai Nawar Jheel

Uttar Pradesh



Uttar Pradesh State Wetlands Authority

Date of Designation

September 19, 2019

Location

Etawah District

Area

161.3 hectares

Designation Criteria

2,3,5,7,8

Wetland Type

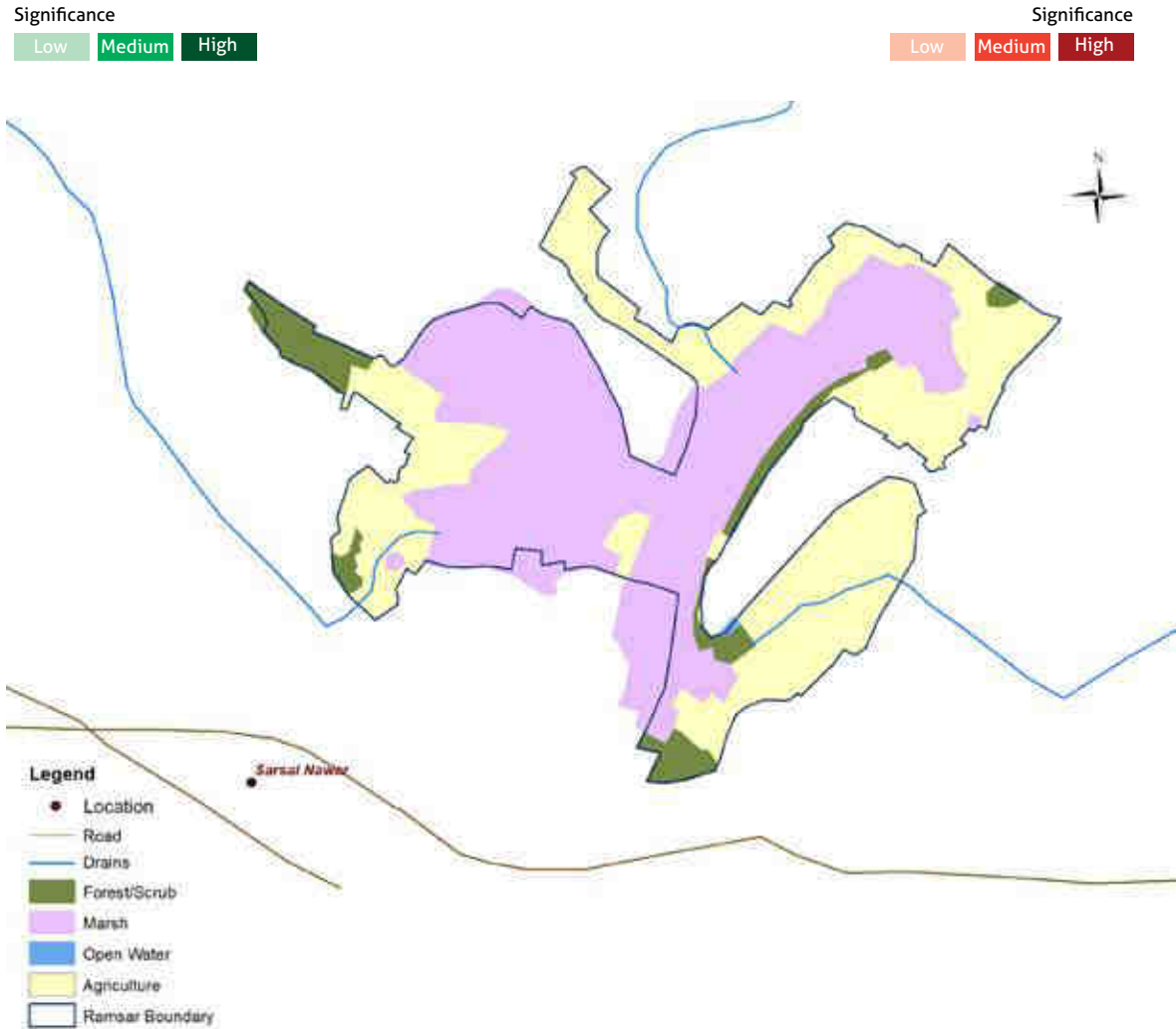
Marsh

Management Authority





Uttar Pradesh State Wetland Authority

Values and Benefits

- 
Water for irrigation
- 
Recharges groundwater
- 
Lifecycle maintenance of fish and water birds
- 
Scientific and educational value
- 
Hajari mahadev temple is revered in the region



Threats

- 
Hydrological regime alteration
- 
Encroachment
- 
Intensive agriculture
- 
Invasive species

Species richness

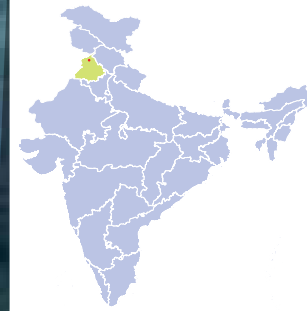
250 Birds
46 Fishes
246 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus crane	White-rumped Vulture	Palla's Fish Eagle	Greater Spotted Eagle, Sarus crane, Woolly necked stork

Beas Conservation Reserve

Punjab



Gitanjali Kanwar

Date of Designation

September 26, 2019

Location

Hoshiarpur, Amritsar, Gurdaspur, Kapurthala, Jalandhar and Tarn Taran Districts

Area

6428.9 hectares

Designation Criteria

2,7

Protection Status

Conservation Reserve

Wetland Type

River stretch

Management Authority

Department of Forest and Wildlife Preservation, Punjab

Values and Benefits



Source of freshwater



Maintenance of hydrological regime



Nutrient and sediment retention



Lifecycle maintenance
Hosts the only population of the Indus River Dolphin in India



Scientific and educational importance



Cultural and Spiritual values

Significance

Low

Medium

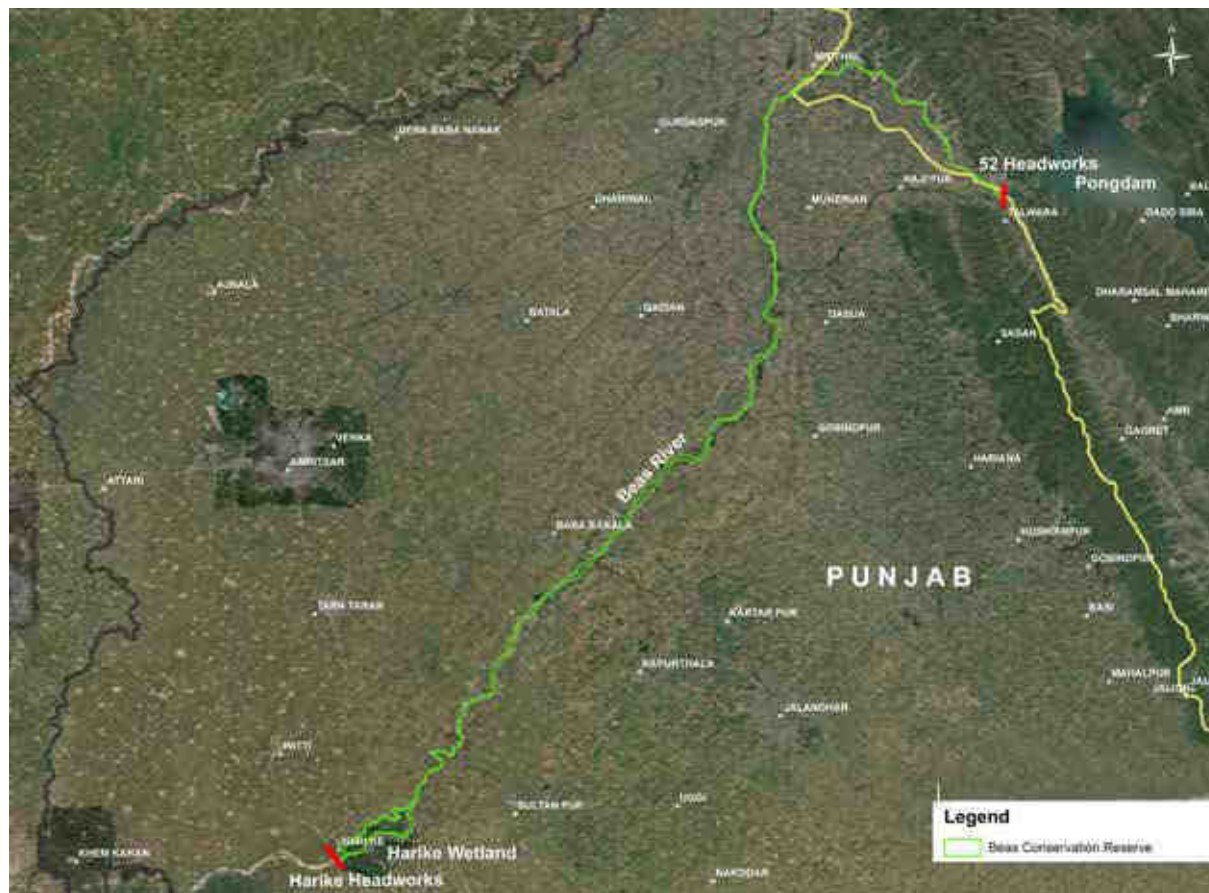
High

Significance

Low

Medium

High



Threats



Alteration in hydrological regimes



Pollution due to domestic and industrial effluents



Encroachment



Over grazing



Water abstraction



Invasive species

Species richness

~500 Birds

90 Fishes

7 Turtles

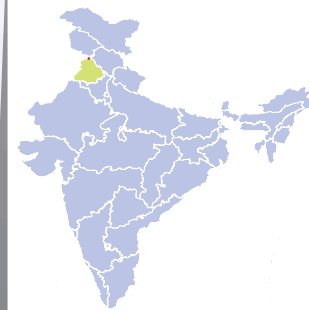
20+ Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Indus river Dolphin, Gharial	Gharial	Indus river Dolphin, Spotted Pond Turtle, Hog Deer, Mahseer, Pabdash Catfish	Common Pochard, Woolly-necked Stork, Crowned River Turtle, Smooth Coated Otter, Indian Softshell Turtle, Common Carp, Wallago Catfish

Keshopur-Miani Community Reserve

Punjab



Citranali Kanwar

Date of Designation

September 26, 2019

Location

Gurdaspur District

Area

343.9 hectares

Designation Criteria

2,5

Protection Status

Community Reserve

Wetland Type

Marshes and aquaculture ponds

Management Authority

Department of Forest and Wildlife
Preservation, Punjab

Values and Benefits



Supports Agro-ecology: Rice, Water chestnut and other crops along with Fisheries



Fodder



Buffers flood



Recharge groundwater



Lifecycle maintenance of migratory species



Scientific and educational importance



Tourism and recreation

Significance

Low

Medium

High



Significance

Low

Medium

High

Threats



Drainage



Pollution due to agricultural runoff



Invasive and alien species

Species richness

131 Birds

27 Fishes

16 Mammals

21 Amphibians & Reptiles

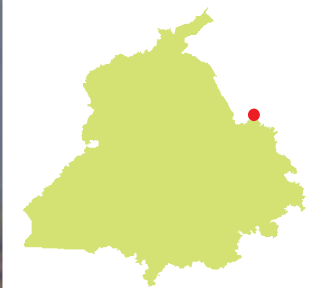
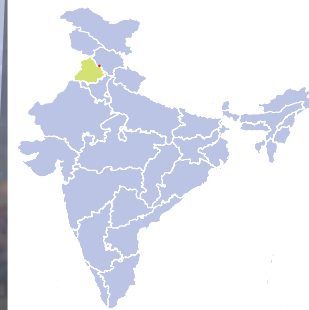
130 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Common Crane, Sarus Crane		Spotted Pond Turtle, Black-bellied Tern	Common Pochard, Woolly-necked Stork, Sarus Crane, Greater spotted Eagle, Indian Softshell Turtle, Common Carp

Nangal Wildlife Sanctuary

Punjab



Wetlands International South Asia Photo Library

Date of Designation

September 26 2019

Location

Rupnagar District

Area

116 hectares

Designation Criteria

2,3

Protection Status

Wildlife Sanctuary

Wetland Type

Reservoir

Management Authority

Department of Forest and Wildlife
Preservation, Punjab

Values and Benefits



Source of freshwater



Buffers flood



Sediment and nutrient retention



Groundwater recharge.



Lifecycle maintenance of migratory birds

Significance

Low Medium High

Significance

Low Medium High



Threats



Pollution
(Sewage inflow and
garbage dumping)



Tourism pressure

Species richness

154 Birds

35 Fishes

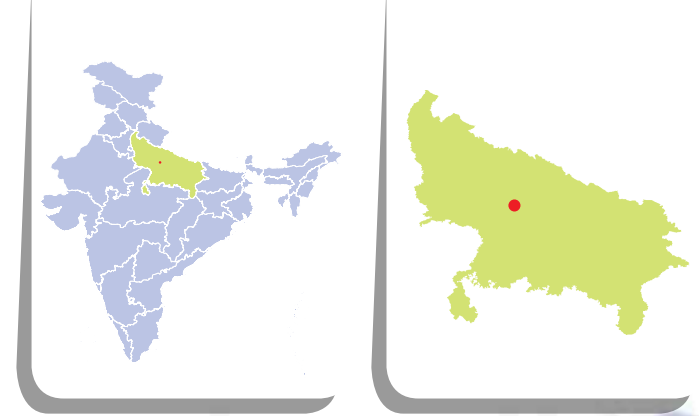
9 Mammals

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
		Pallas's Fish Eagle, Egyptian Vulture, Black-bellied Tern, Hog Deer, Indian Pangolin, Golden Mahseer	Common Pochard, Leopard, Wallago Catfish, Burmese Python

Sandi Bird Sanctuary

Uttar Pradesh



Uttar Pradesh State Wetlands Authority

Date of Designation

September 26, 2019

Location

Hardoi District

Area

308.5 hectares

Designation Criteria

2,3,4,5,6,7

Protection Status

Bird Sanctuary







Wetland Type

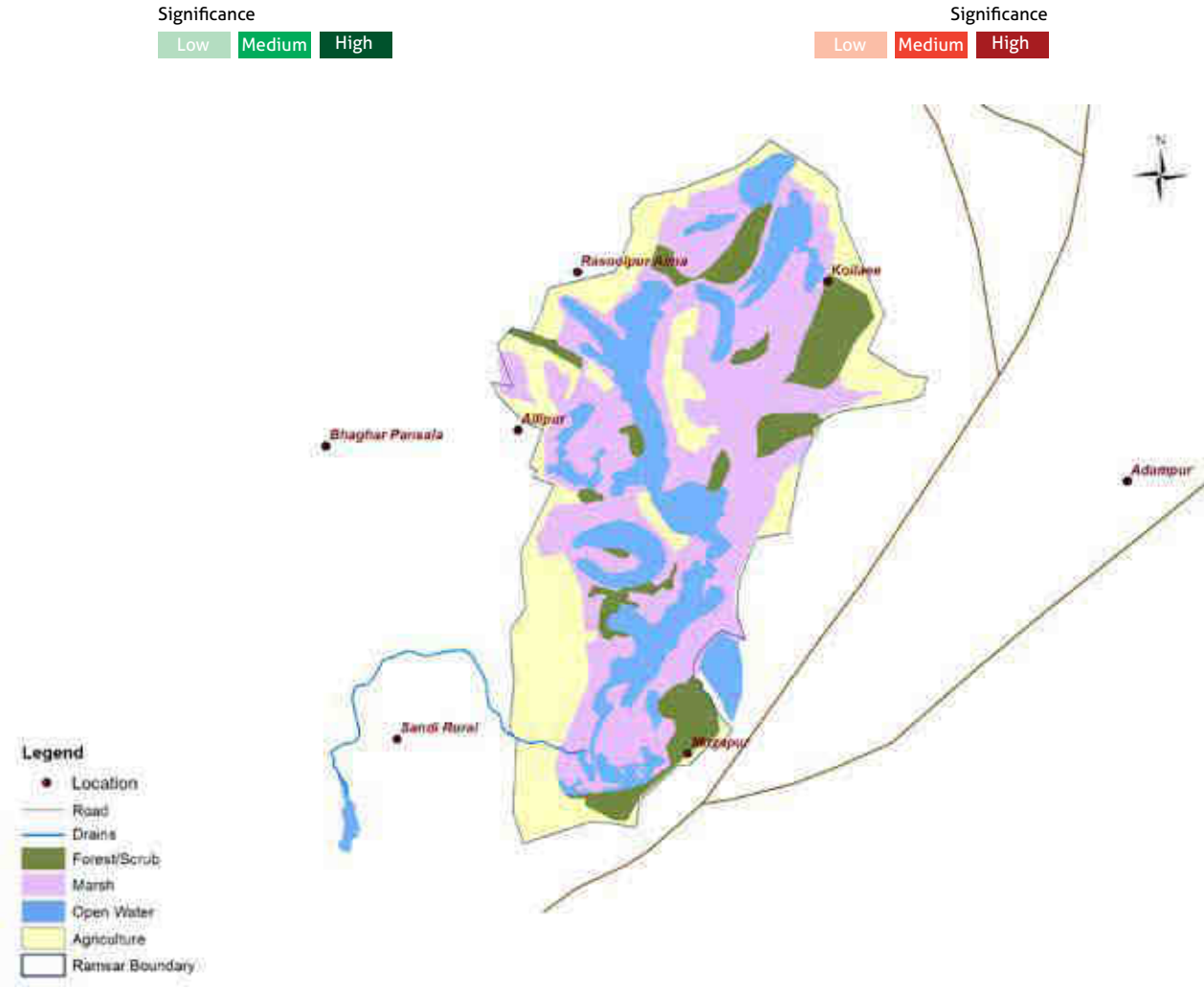
Freshwater marsh

Management Authority

Uttar Pradesh State Wetland Authority

Values and Benefits

-  Water for agriculture
-  Fisheries for livestock
-  Recharges groundwater
-  Buffers floods
-  Maintenance of lifecycles of migratory birds
-  Tourism and recreation



Threats

-  Pollution
-  Encroachment
-  Over grazing
-  Water abstraction for agriculture
-  Invasive species

Species richness

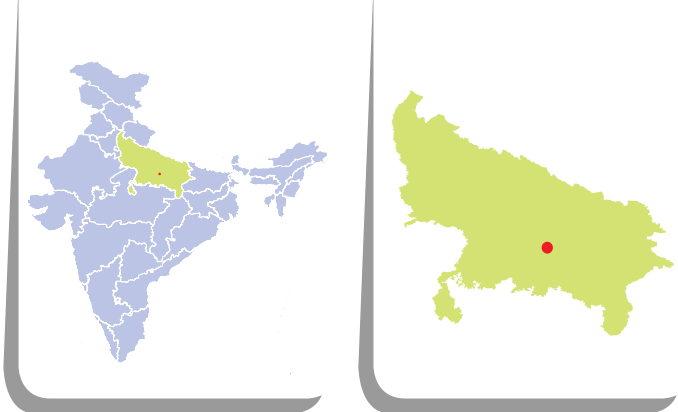
- 150 Birds
- 13 Fishes
- 19 Mammals
- 18 Reptiles & Amphibians
- 209 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus Crane			Greater Spotted Eagle, Sarus Crane

Samaspur Bird Sanctuary

Uttar Pradesh



Uttar Pradesh State Wetlands Authority

Date of Designation	Location	Area	Designation Criteria	Protection Status
October 3, 2019	Raebareli District	799.4 hectares	2,3,4,5,6,7	Bird Sanctuary
Wetland Type			Management Authority	
Freshwater marsh			Uttar Pradesh State Wetland Authority	

Values and Benefits

- 

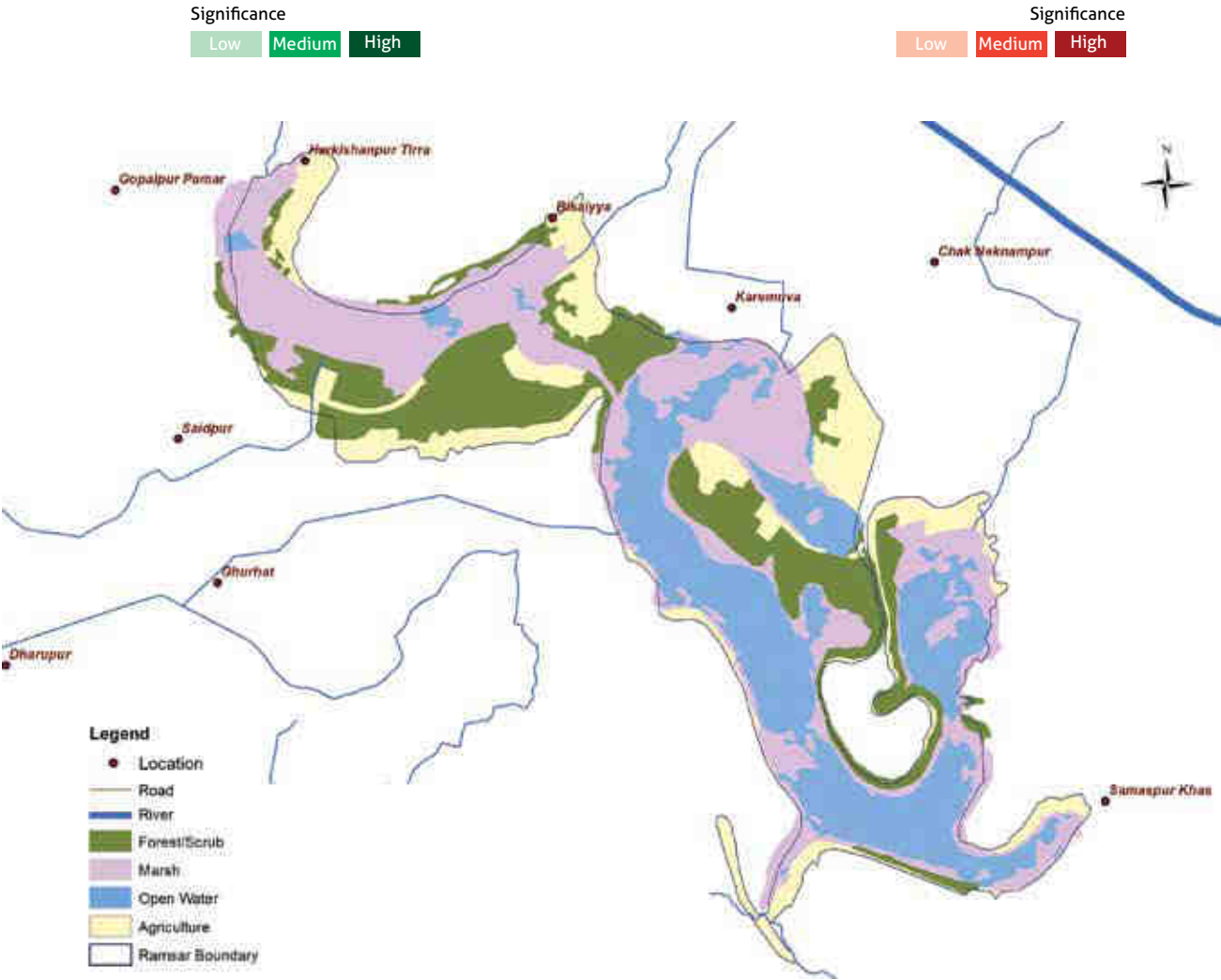
Water for agriculture
- 

Fisheries
- 

Fodder
- 

Buffer for floods
- 

Groundwater recharge



Threats

- 

Drainage
- 

Siltation
- 

Pollution
- 

Over grazing
- 

Intensive agriculture
- 

Invasive species

Species richness

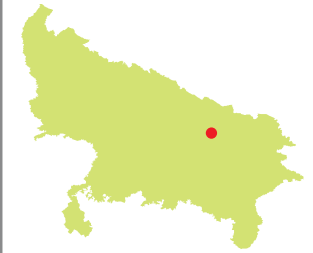
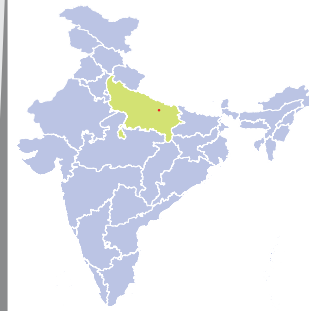
250 Birds
46 Fishes
149 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus Crane		Pallas’s Fish Eagle	Greater Spotted Eagle, Common Pochard, Sarus crane

Parvati Arga Bird Sanctuary

Uttar Pradesh



Uttar Pradesh State Wetlands Authority

Date of Designation

December 2, 2019

Location

Gonda District

Area

722 hectares

Designation Criteria

2,3,4,5,8

Protection Status

Bird Sanctuary

Wetland Type

Freshwater marshes

Management Authority

Uttar Pradesh State Wetland Authority

Values and Benefits



Water for agriculture



Groundwater recharge



Buffers flood



Maintenance of lifecycles of migratory birds and fish



Scientific and educational values



Cultural and spiritual importance

Significance

Low

Medium

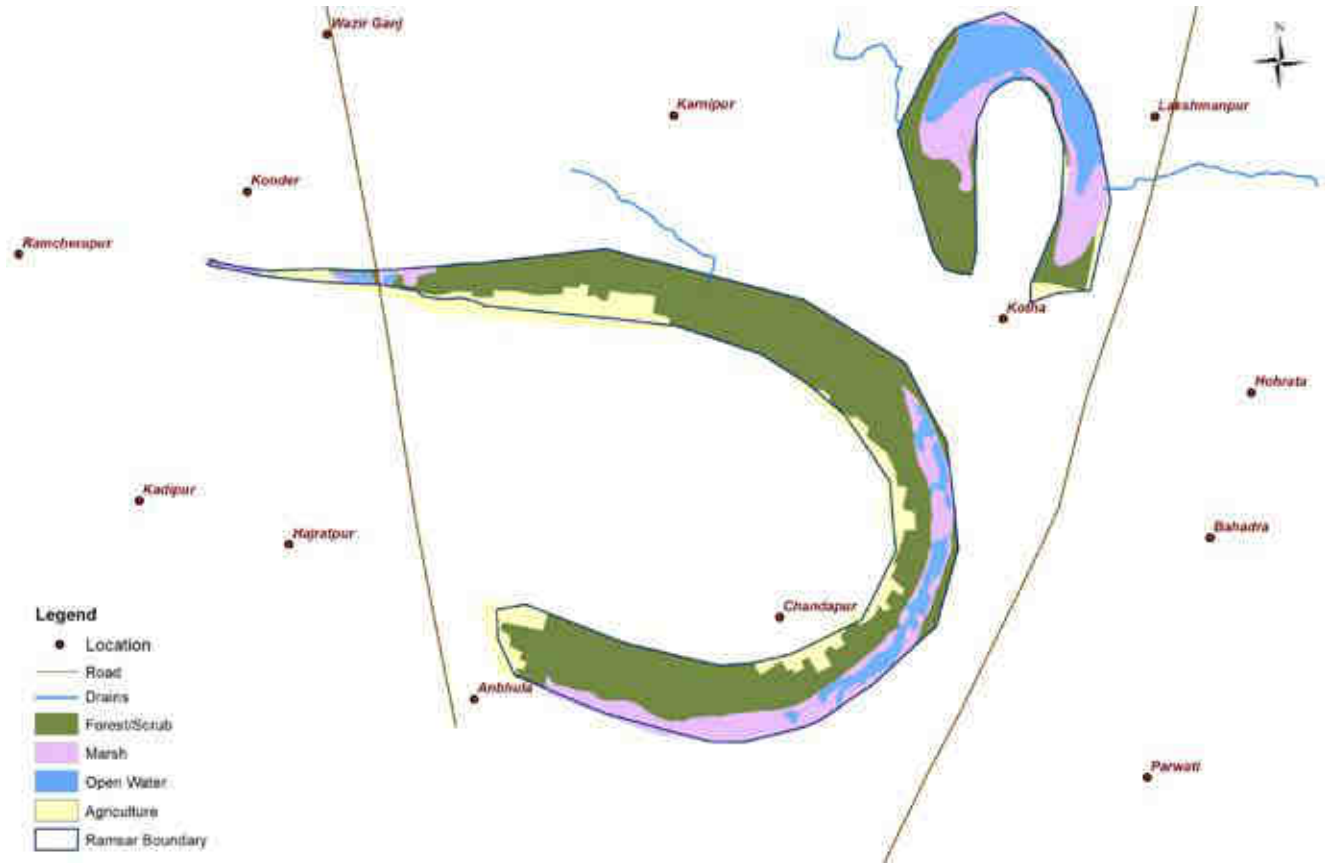
High

Significance

Low

Medium

High



Threats



Pollution from agricultural run-off



Regime fragmentation through roads



Invasive species,



Tourism pressure

Species richness

37 Birds

18 Mammals

2 Reptiles & Amphibians

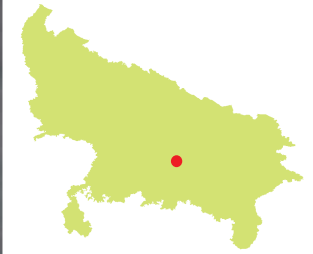
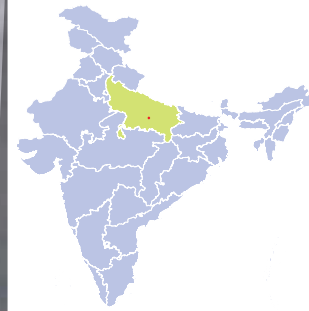
37 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus Crane	White-rumped Vulture, Indian Vulture	Egyptian Vulture	Greater Spotted Eagle, Common Pochard, Woolly-necked stork, Sarus Crane

Saman Bird Sanctuary

Uttar Pradesh



Uttar Pradesh State Wetlands Authority



Date of Designation

December 2, 2019

Location

Mainpuri District

Area

526.3 hectares

Designation Criteria

2,3,4,5,6

Protection Status

Bird Sanctuary


Wetland Type


Freshwater marsh


Management Authority


Uttar Pradesh State Wetland Authority

Values and Benefits

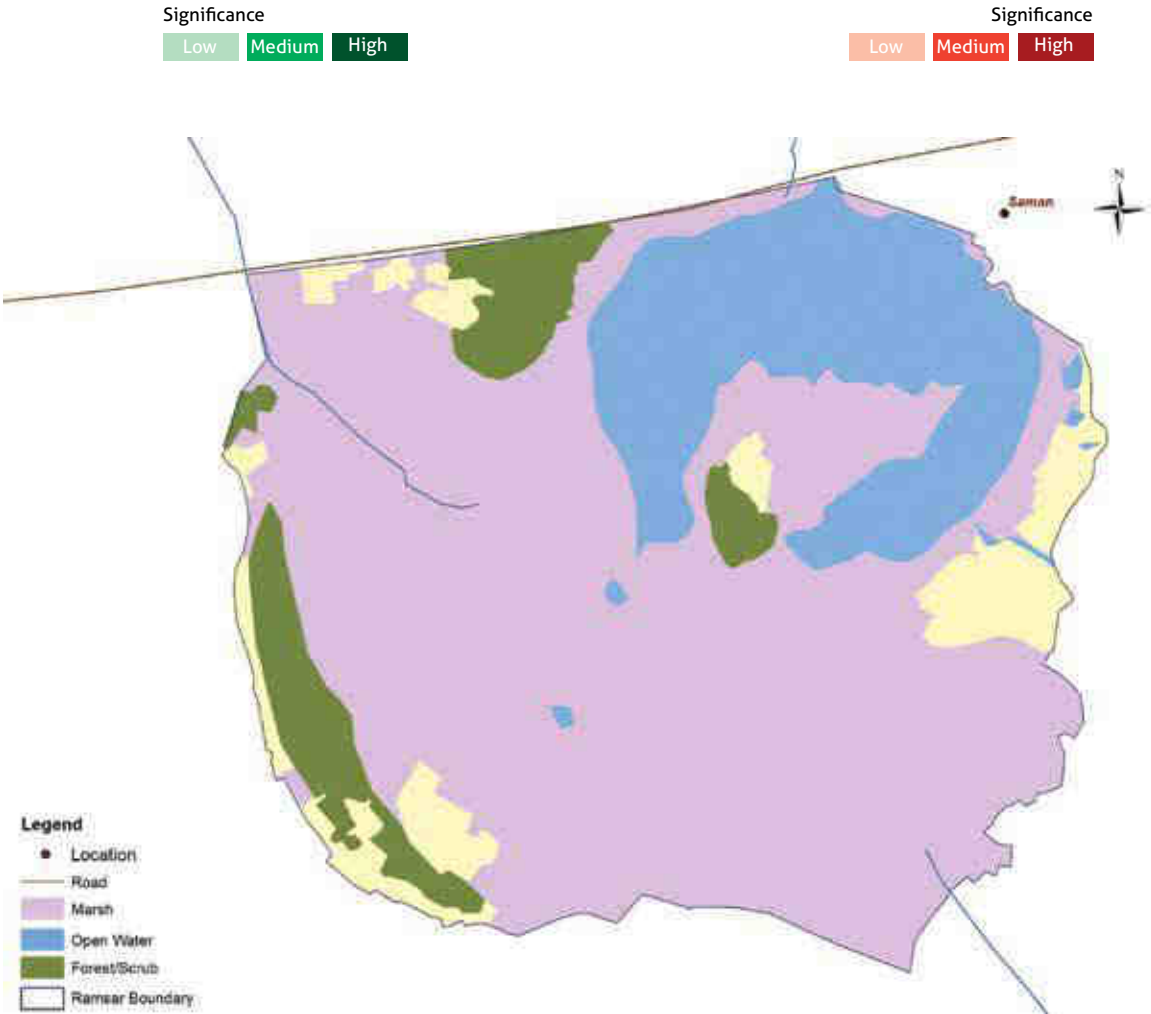
- 

Water for agriculture
- 

Groundwater recharge
- 

Habitat for migratory waterbirds
- 

Recreation and tourism



Threats

- 

Pollution
- 

Encroachment
- 

Over grazing and feral dogs
- 

Intensive agriculture
- 

Invasive species

Species richness

187 Birds

11 Mammals

154 Plants

Species of global conservation significance

Notable	Critically endangered	Endangered	Vulnerable
Sarus Crane		Palla’s Fish Eagle, Egyptian Vulture	Greater Spotted Eagle, Sarus crane

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Wetlands
INTERNATIONAL



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für Internationale
Zusammenarbeit (GIZ) GmbH

On behalf of:



Federal Ministry for the
Environment, Nature Conservation
and Nuclear Safety

of the Federal Republic of Germany