## **Ramsar Information Sheet**

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1. Date this sheet was completed: 01.06.1997

**2. Country:** Estonia

3. Name of wetland: The Hiiumaa Islets and Käina Bay

(in Estonian: Hiiumaa laiud ja Käina laht)

**4. Geographical co-ordinates:** 58°48N 22°58'E

**5. Altitude:** 0-10 m above sea level

**6. Area:** 17,700 ha

#### 7. Overview

Shallow water shelf sea with small islets and bays. Coastal meadow and salt marshes of Salinomme. Eutrophic brackish lagoon - Käina Bay - with reedbeds and 23 small low islets.

8. Wetland type: ABEHJ

**9. Ramsar Criteria:** 1a, 2a, 2b, 3a, 3b, 3c, 4b

10. Map of site included: Yes

#### 11. Name and address of compiler:

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# 12. Justification of criteria selected under point 9:

1a - it is a particularly good representative example of a natural or near-natural wetland, characteristic of the appropriate biogeographical region

2a - it supports an appreciable assemblage of rare, vulnerable or endangered species or subspecies of plant or animal, or an appreciable number of individuals of any one or more of these species

2b - it is of special value for maintaining the genetic and ecological diversity of a region because of the quality and peculiarities of its flora and fauna

3a - it regularly supports 20,000 waterfowl

3b - it regularly supports substantial numbers of individuals from particular groups of waterfowl, indicative of wetland values, productivity or diversity

3c - it regularly supports > 1% of the individuals in a population of *Cygnus columbianus*, *Cygnus cygnus*, *Branta leucopsis*, *Anser anser* and *Grus grus*.

4b - 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.

#### 13. General location:

Hiiu County; Hiiumaa Island, 20 km south-east from Kärdla town (4300 inhabitants).

#### 14. Physical features:

Natural origin. Ordovician limestone, covered by moraine gravel, sand and sea sediments; water salinity 5-6%; maximum amplitude of water level 2-3 m, on average 2.3 m; salty coastal soils and typical sod-calcareous soils; water depth 0-5 m, on average 2-3 m; mean annual temperature 5.6°C and precipitation 580mm.

Käina Bay: Ordovician limestone, covered by clays sea sediments (curative sea-mud); water salinity 2-3‰; maximum amplitude of water level 1 m; salty coastal soils; water depth 0-1 m, on average 0.5 m.

# 15. Hydrological values:

Prevention of coastal erosion, sediment trapping, maintenance of water quality and support of food chains.

## 16. Ecological features:

Shallow water and bottom vegetation (Rivularia coadunata, Cladophora glaucescens, Chara aspera, Fucus vesiculosus, Furcellaria fastigiata etc.); coastal meadows (ass. Glauco-maritima-Juncus gerardii and Festucetum arundinaceae); shrubs (Juniperus communis, Rhamus catharctica, Ribes alpina, Rosa spp.); forests (Pinus sylvestris, Populus tremula, Betula pendula, Quercus robur). Käina Bay: shallow water (Chara aspera, C. tomentosa, Potamogeton spp.), mud-flats, reedbeds, semi-natural coastal meadows (Festuca spp., Carex spp.), juniper bushes and small coppices of Alnus glutinosa and Pinus sylvestris.

# 17. Noteworthy flora:

Endangered orchid-rich communities; unique and endangered broad-leaved forest (*Quercus-Tilia-Acer* community); endangered bottom vegetation (*Zostera marina*; algae *Furcellaria fastigiata*, *Polysiphonia nigrescens*); rare-in-Estonia *Eleocharetum parvulae* ass. and good examples of *Suaeda maritima* var. and *Salicornietum europeae* ass. Good example of native reedbed and *Eleocharis uniglumis* communities in Käina Bay.

# 18. Noteworthy fauna:

Fish: Important spawning areas for many fish species: *Belone belone, Coregonus lavaretus, Vimba vimba, Esox lucius, Leuciscus idus, Alburnus alburnus* etc. Also endangered *Siluris glanis* and endemic *Coregonus lavaretus maraenoides*.

Amphibians: Bufo calamita.

Birds: (a) breeding: Botaurus stellaris (2 pairs), Halieetus albicilla (2 pairs), Recurvirostra avosetta (90 pairs), Limosa limosa (20 pairs), Calidris alpina schinzii (20 pairs), Cygnus olor (>200 pairs), Anser anser (80 pairs), Anas strepera (25 pairs), Panurus biarmicus (60 pairs); (b) staging: Branta leucopsis (2000-4000), Anser anser (up to 2000), Aythya marila (1000), Clangula hyemalis (3000), Melanitta nigra et fusca (1000), Bucephula clangula (1500), Anas penelope (5000), Anas platyrhynchos (3000), Aythya ferina (2000), Aythya fuligula (1000), Fulica atra (2000) and Grus grus (2000); in total >20,000 staging waterfowl in autumn regularly.

Mammals: Regular halting ground of the Ringed Seal *Phoca hispida* (70-100 ind.)

# 19. Social and cultural values:

Important area for fishing and ecotourism as well as for environmental education and scientific research. Notable reserves of curative sea-mud in Käina Bay.

# 20. Land tenure/ownership of:

- a) site: State and private lands.
- b) surrounding area: State and private lands.

# 21. Current land use/principal human activities:

- a) site: About 100 inhabitants; extensive agriculture, fishing and tourism. Käina Bay: no inhabitants, extensive cattle grazing.
- b) Surroundings/catchment: About 800 inhabitants, extensive agriculture, forestry, fishing, hunting and tourism.

# 22. Factors adversely affecting the site's ecological character, including changes in land use and development projects:

- a) site: Water pollution from the surrounding area (agricultural and waste water from Käina and from other settlements), excessive human disturbance.
- b) Surroundings/catchment: Agricultural pollution and excessive human disturbance, hunting and fishing.

## 23. Conservation measures taken:

Hiiumaa Islets Landscape Reserve established in 1971, includes 16 islets with a total area of 313 ha. Ornithological Reserve of Käina Bay, established in 1971 (annual shooting and seasonal visiting ban). The Hiiumaa Islets and Käina Bay are part of the West-Estonian Archipelago Biosphere Reserve,

which was founded in 1990. Käina Bay was designated IBA in 1989 (cat. I), proposed categories in 1996: A4, B1.

## 24. Conservation measures proposed but not yet implemented:

The protection rules are in preparation. According to Estonian Governmental Regulation No. 48 of 4 March 1997 the management plan has to be completed by 2002. Käina Bay and 4 islets with surrounding sea are planned as the core areas of the West-Estonian Archipelago Biosphere Reserve, which was founded in 1990. The Hiiumaa Islets is proposed IBA in 1996 (cat. I); categories: A4.

#### 25. Current scientific and research facilities:

Monitoring (fish, plant and bird communities; seals), plant and bird phenology; field research station at Salinomme. Long-term monitoring of breeding and staging waterfowl in Käina Bay.

#### 26. Current conservation education:

Visitors Centre and bird tower at Salinomme; 2 information booklets on Hiiumaa Islets and Käina Bay. Nature trail with three bird towers in Käina Bay.

## 27. Current recreation and tourism:

Angling and sailing outside the nature reserves; limited and regulated eco-tourism in the nature reserves during summer months.

#### 28. Jurisdiction:

Käina Commune, Hiiu mnt 28, Käina, Hiiumaa, EE3213

Pühalepa Commune, Hellamaa, Hiiumaa, EE3210

Estonian Ministry of Environment, Department of Nature Conservation and Wildlife Management, Tompuiestee 24, EE0100, Tallinn, Estonia

#### 29. Management authority:

Hiiumaa Islets Landscape Reserve, Salinõmme, EE3211 Suuremõisa, Hiiumaa, Estonia. Hiiumaa County Administration, Dept. of Nature Conservation, Kõrgessaare mnt. 18, EE3200 Kärdla, Estonia.

# 30. Bibliographical references:

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