

A resting and feeding site for thousands of swans that has been conserved by local people for more than 300 years

Hyo-ko

Water Storage Area, Pond

Geographical coordinates: 37° 50' N, 139° 14' E / Altitude: 8.6m / Area: 24ha / Major type of wetland: water storage area, pond / Designation: Special Protection Area of National Wildlife Protection Area / Municipalities involved: Agano City, Niigata Prefecture / Ramsar designation: October 2008



Hyo-ko filled with blooming lotuses in summer



Hyo-ko from the west in winter



Hyo-ko from the south

Harvesting water chestnuts



Principal Features:

With Agano River running from Fukushima Prefecture meandering through, the northeast inland of the Niigata Plain is a flat and wet lowland that stretches out with a vast field of rice paddies.

Hyo-ko is a small pond found in Agano City, the core of the rice production area. It was made in Edo-period (1639) as an irrigation reservoir. Initially the shape was like a gourd, but one cannot see the image any more because the part of the pond was filled in. With the addition of three more ponds - Higashi-shin-ike developed in 1991 and Sakura-ike and Ayame-ike in 2000, the four ponds are now open to the public as the Hyo-ko Waterbird Park. Hyo-ko is not used for irrigation purpose any more.

Hyo-ko is only 0.7m deep in average, and 1.2m at the deepest. It has very small inflows collected from the nearby streams, but is practically a static pond. Plant species such as "Onibishi" *Trapa natans* var. *japonica*, Lotus, and Prickly Water Lily *Euryale ferox* are thriving in the pond, and Reed and Manchurian Wild Rice are found on the shore.

Although cherry trees are planted on the bank, because of the low and flat

levee, the pond can be observed from all the directions.

Hyo-ko as the "Swan Lake":

In Edo-period, hunting was prohibited in Hyo-ko. In the subsequent Meiji-period and thereafter, hunting has been prohibited habitually, and thus Hyo-ko became a paradise for waterbirds. Still today, serving as a feeding and resting place for migratory birds, Hyo-ko welcomes every year approx. 6000 swans including Tundra Swan in addition to more than 30,000 ducks such as Northern Pintail *Anas acuta*, Mallard *Anas platyrhynchos*, Common Teal *Anas crecca*, and Pochard *Aythya ferina*.

In particular, Hyo-ko is the first place in Japan where the people succeeded in feeding swans in 1954. Hyo-ko came to be known nationwide as the "Swan Lake," and it greatly influenced the movement for the wild bird protection. The local people - from children to the elderly - participate actively in the community-based protection activities. The lake is fully equipped with facilities such as "Hakucho-no-sato" (Swan museum).

Wetlands scattered on Niigata Plain:

In addition to Hyo-ko, the Niigata

Plain - a major rice production area - provides many safe and rich resting sites for migratory birds, including Sakata (a Ramsar site), Toyonogata, and Fukushima-gata. Hyo-ko is a part of the Waterbird Site Network based on the Partnership for the East Asian-Australasian Flyway.

[Tundra Swan *Cygnus columbianus*]

In Hyo-ko, 90% of the swans are Tundra Swans. They stay from the mid of October to the mid of March, for feeding and resting in Hyo-ko and the neighboring rice paddies. Every morning, they fly from their resting area around 6:30 - 9 a.m., collect their foods such as remains of rice seeds after harvest on the rice paddies, and go back to their resting area around 3 p.m. They move around together in a group of family members, accompanying their juvenile birds. Only a limited number of birds - such as ill or injured birds - are dependent on artificial feeding. The nocturnal ducks spend the daytime in Hyo-ko in contrast.

Contact Information:

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