

Distribution and population changes of the White Stork *Ciconia ciconia* in the northwestern USSR

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At the turn of the century, Estonia and the Leningrad region lay at the northern limit for the distribution of the White Stork, the bird being occasional in both areas. Since that time, considerable changes have taken place. In Estonia, the years 1954–1971 were a period of population growth, though the population sometimes fluctuated dramatically. During these years White Storks expanded their range, and in 1972 they bred successfully in the Leningrad region. In 1974, the total Estonian population comprised 1060 pairs, more than three times as many as 20

years earlier (for population trends in Estonia, Latvia and Lithuania up to the mid-1970s, see Veromann 1976, *Ornis Fennica* 53:150–152). During 1975–80 only minor changes took place in Estonia, but the range expanded further. During the 1980s the population has grown again. Now there are at least 1500 pairs of White Storks in Estonia, and the expansion towards the east continues, which is in sharp contrast with the population collapse recorded in Western Europe.

The Mute Swan *Cygnus olor* in Estonia

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During 1908–28 one or two Mute Swan pairs bred annually on Saaremaa island, western Estonia. After being exterminated, probably by poachers, the Mute Swan recolonized Estonia in 1959. In 1964 there were 10–11 breeding pairs. The population continued to increase, and in 1973 the number of pairs reached 80. The results of the following censuses showed a continuous increase: 1974 110, 1978 276, 1980 about 225, 1983 390 and 1985 310 pairs. In 1965–73 the number of incubating pairs increased by 26% per year, in 1974–78 by 28% and in 1981–83 by 20%. Severe winters in 1978/79 and 1984/85 reduced the population by nearly 25% and decreased the breeding success.

The largest local populations breed in Käina Bay (1000 ha: 61 nest-sites in 1983 and 47 in 1985) and

in the eastern parts of Matsalu Bay (3000 ha: 55 nest-sites in 1983 and 50 in 1985).

The breeding success of the Estonian Mute Swans depends on the winter conditions. Most Mute Swans overwinter in the coastal waters of Estonia. In January there may be up to 800 individuals. After the mild winter of 1982/83, the nests contained on average 5.16 ± 1.78 (SD, $n = 188$) eggs, which produced 4.37 ± 1.86 young (222). After the severe winter of 1984/85 the corresponding figures were 4.17 ± 1.72 (103) and 3.15 ± 2.01 (78).

Most pairs breed on small islets (31% of all pairs in 1978 and 55% in 1985) or in coastal reed-beds (53% in 1978 and 31% in 1985). Breeding attempts in the Estonian lake district have been unsuccessful up to 1985 (first successful breeding in 1986).

Extensive spring rest in Estonia of migrating Brent Geese *Branta leucopsis* — a newcomer to the Estonian breeding fauna

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Great flocks of the Brent Goose arrive in western Estonia in the third week of April. The numbers peak in the first half of May, and the birds resume migration in mid-May with mass departure (mainly to

NNE–NE) during at most a couple of days between 18 and 25 May.

The Brent Goose population of the Barents Sea amounts at present to about 70 000 birds (B.