# The Peregrine Falcon in Greenland

# a long-distance traveller



In South Greenland, the Peregrine feeds mainly on small birds such as Snow Bunting and Wheatear, newly fledged and inexperienced young birds are abundant when the falcons need to carry a lot of food to their hungry chicks



The Peregrines migrate from Greenland to spend the winter in Latin America, mainly flying along the coast of North America. They arrive in Greenland in May, and leave again in late September. Travelling between arctic and tropical areas requires an ability to capture many different types of food along the way. The map shows places where South Greenlandic Peregrines have been found.

Peregrines nest on high cliffs so to study them requires a lot of rope

A ringed pair of Peregrines

The birds return to breed at the same cliff every year – we have records of up to 14 years. About

20% of the females die/disappear

each year, and the territory is taken over by a new bird.



**Peregrines are breeding gradually earlier,** probably as a result of climate change, but only about 5 days earlier on average since 1981. Data are still to be analysed in more detail.



Peregrines on average have three chicks per year in South Greenland; four is the maximum.

#### New pollutants are on the rise

Dead eggs that do not produce a young (picture above) are collected and analysed for pollutants. While the eggs contain decreasing loads of the "old" compounds like DDT and PCB, new chemicals such as 'brominated flame retardants' (hormone-disturbing) are now found to increase, as seen on the graph above.



Eggshell thickness is improving (above) Pesticides (DDT etc.) used in the Americas have caused Peregrines to lay eggs with thin shells. Pieces of eggshells collected in Greenland since 1972 show a very gradual improvement since DDT use was dramatically reduced, but the Greenlandic Peregrines cannot expect to have "normal" shell thickness within the next 20 years.





## Publications

K. Vorkamp, M. Thomsen, S. Møller, K. Falk, P.B. Sørensen. Persistent organochlorine compounds in peregrine falcon (Falco peregrinus) eggs from South Greenland: Levels and temporal changes between 1986 and 2003. *Environment International.* 2009, 35 (2), 336-341.

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