# The Gyr Falcon in Finnmark



Information sheet for the project «Bird tourism in central and eastern Finnmark», a project part of «The natural heritage as a value creator (M)»

The Gyr Falcon is the world's largest falcon. Due its hunting skills, it is one of the most highly valued and most sought-after birds of prey among falconers. It has a circumpolar distribution, and is the only falcon species that regularly overwinters in the Arctic. In order to survive the long and cold winter in the north, it has developed a number of special adaptations, among these a specially insulating plumage. The Gyr Falcon is distributed in mountain areas in the major part of Norway, but is most numerous in the northernmost counties. Even here it is a scarce breeding species which is seldom seen away from the nesting territory.

The Gyr Falcon (Falco rusticolus) varies in colour from almost entirely white birds (Greenland) to very dark (Labrador, Canada). In Scandinavia, adult Gyr Falcons are a medium-coloured grey variant, and only occasionally are paler birds observed. The male is the smaller, and has only about 65% of the body weight of a female. A large female weighs up to 2 kg. The body length of a female Gyr Falcon is 51-64 cm, of the male 48-61 cm. The young of the Gyr Falcon have a grey-

brown upper side, and the basic colour of the underside is yellowish beige. The whole of the breast and abdomen have marked streaks. The legs and cere are blue. Adult birds have a blue-grey upper side with paler barring and spots. The basic colour of the underside is white, with a variable density of barring, especially on the leg feathering and body sides. The legs and cere are yellow.

In flight the Gyr Falcon can be distinguished by its powerful body and relatively broad wings. In active



Male Gyr Falcon at the nest site







The Fyr Falcon can be distinguished by its broad wing basis and long tail. The photo shows a young bird.

flight, however, it appears effortless, and the outer part of the wings does most of the work. The long tail separates it from the slightly smaller Peregrine Falcon. At close range the underside of the wing, with dark underwing coverts contrasting with pale primaries, distinguishes the Gyr Falcon from the Peregrine Falcon. In some situations the Gyr Falcon can be confused with the Goshawk, but the hawk normally has a quite different flight pattern.

As other falcons, the Gyr Falcon uses high points in the terrain to watch for prey, and often sits on stones, poles or electricity pylons that give a good view.

### Occurrence in Finnmark

Finnmark has, right from historical times, been regarded as a core area for the Scandinavian Gyr Falcon population. In the Middle Ages the falcon was used as a gift between noblemen on the continent, and European falcon catchers took falcons in Finnmark as early as the 1200's. In the 1850's the catching of falcons had ceased, but collecting and describing the eggs of different bird species had become an important science. Many foreign egg collectors visited Finnmark, and the eggs of the Gyr Falcon were among the most valuable. In Kautokeino a number of Sami people who knew the localities helped the collectors, and for some this was an important extra income.

The Gyr Falcon breeds throughout most of the county, but the number of occupied territories and the production of young varies in correlation with availability of the primary prey species – grouse and ptarmigan. In a study area in Alta and Kautokeino Districts in the period 2001-2011, the number of occupied territories

varied from 3 to 24 – an increase of 800% from lowest to highest year! Data from British egg collectors who operated on Finnmarksvidda around 1850, showed that also at that time there were great variations from year to year. Fortunately, comparisons show that the Gyr Falcon population has remained quite stable during the last 150 years.

# **Breeding biology**

The Gyr Falcon begins the breeding season while there is still full winter in the mountains. As early as January the male starts to bring food to the nest site where it delivers prey to the waiting female. The earliest pairs begin egg laying in late March, and from then on, activity increases at the nest site. The Gyr Falcon pair perform display flight, delivering of prey and mating with increasing frequency, accompanied by load screams. The 3-4 reddish-brown eggs are usually laid in an old Raven nest, more rarely in the nest of another cliff-nesting bird of prey or direct on a grass-covered ledge. Of 94 nests found in the Alta-Kautokeino area, 86 were in Raven nests or artificial imitations of these. The female does most of the incubation, while the male provides the food. The eggs hatch after 34-36 days, and the young are on the wing 42-45 days later. The female also begins to hunt when the young are about 2 weeks old, which gives greater variation in the type of prey that the falcons bring to the nest. In addition to the main prey, grouse and ptarmigan, the Gyr Falcon also takes a number of medium-size birds such as ducks, waders and crow species, as well as small rodents. It is also not unusual that other birds of prey or owls may



The Gyr Falcons sit at fixed places by the nest, where in time, marked stripes are formed from their droppings.





be found on the Gyr Falcon's menu. Most of the Gyr Falcon clutches in Finnmark leave the nest at the end of June. The parents provide for them until they become independent about a month after leaving the nest.

## Wandering

The Gyr Falcon is resident, but young birds in Finnmark apparently move out to the coast in their first year of life. Examples of this are several nestlings, ringed on Finnmarksvidda, that were found later on the coast of Finnmark, Troms and Nordland. It is probably the numbers of seabirds that tempt young Gyr Falcons to the coast of Finnmark in winter. The adult falcons can be seen at the nest site throughout the winter and appear to be resident. However, in years when grouse and ptarmigan are few, it is possible that some adult individuals move away from the breeding localities.

### **Threats**

The primary threats to the Gyr Falcon are thought to be reduced populations of prey, disturbance at the nest sites, and habitat destruction. Climate change with increased growth of vegetation on the open mountain terrain affects both the prey populations and the Gyr Falcon's hunting habitat in negative direction.

On Finnmarksvidda the Gyr Falcon has a limited number of suitable nest sites. The Gyr Falcon is also extremely bound to the traditional nest sites. From Finnmark we know that many of the nest sites that egg collectors described in the 1850s, are still in use today. From Greenland it has been proved that Gyr Falcons have used the same site for 2700 years! It is therefore essential, for preservation of the species, that traditional nest sites are protected.

Habitat destruction in the form of new cabins, motor tracks or road building, can make the nest sites permanently unsuitable for the falcons. I Finnmark there have been instances when illegal snow-scooter driving has spoilt the nesting season of the Gyr Falcon. Dry-ground driving right up to the nesting cliff during the breeding season can easily cause the falcons to desert the nest. In Russia, illegal trade in eggs and young now occurs on a large scale, but also in Norway several cases of such fauna crime have been revealed. In case of suspicion of illegal activity at Gyr Falcon nest sites, the local police should be contacted.

This fact sheet is prepared by Arve Østlyngen All photos: © Arve Østlyngen

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Typical nest site of Gyr Falcon on a steep cliff with a protective overhang.



