GRIFFON VULTURE RESTORATION IN THE BALKAN MOUNTAINS OF BULGARIA

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BACKGROUND

A total of four species of vultures were known to nest in Bulgaria: Eurasian Griffon Vulture (*Gyps fulvus*), Black Vulture (*Aegypius monachus*), Egyptian Vulture (*Neophron percompterus*) and Bearded Vulture (*Gypaetus barbatus*) (Patev 1950, Simeonov and Michev 1990).

In the beginning of XXI century only two of the species remained as nesting - Griffon and Egyptian Vultures. The last breeding of Black Vulture was confirmed in 1992 (Marin, Rogev et al. 1998, Stoynov, Kurtev et al. 2007), while Bearded Vulture has been considered extinct since the 70s of XX century, despite occasional sightings of individual birds (Donchev 1974, Stoynov 2007).

PROJECT

In 2003, following over 20 years of local conservation efforts, a long-term International Action Plan for the Recovery and Conservation of Vultures on the Balkan Peninsula and Adjacent Regions (BVAP) was initiated. It provides for a step-by-step recovery of the species, starting with Griffons and finishing with Bearded Vultures. A specialized project "Recovery of the Populations of Large European Vultures in Bulgaria" LIFE08 NAT/BG/278 was therefore triggered in 2010. The project is carried out by Green Balkans in partnership with the Fund for Wild Flora and Fauna (FWFF) and the Birds of Prey Protection Society (BPPS).

The overall aim of the project was restoring the populations of the three large vulture species in Bulgaria through conservation measures and increasing the institutional capacity for their conservation.

Following the successful implementation of that project, a new seven-year project Bright Future for Black Vulture LIFE14 NAT/BG/649 was launched in 2015. It is once again implemented by Green Balkans in partnership with the Fund for Wild Flora and Fauna (FWFF), the Vulture Conservation Foundation (VCF), EURONATUR and GOBEX.

TARGET AREAS

The main actions related to the practical restoration Griffon Vultures in the Balkan Mountains of Bulgaria, such as release, supplementary feeding, limiting threats, elaboration of voluntary networks of farmers and collaborators, took place at four big adaptation aviaries, located in the following sites from the NATURA 2000 European network of protected areas: Vrachanski Balkan, Central Balkan, Sinite kamani – Grebents and Kotlenska Stara planina.

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RELEASE

The original plan was to follow the release methodology successfully used for the restoration of Griffon Vulture in the Alps (Choicy and Terrasse, 2007). The methodology was later modified as explained below.

Between 2010-2014 a total of 264 Griffon Vultures (*Gyps fulvus*) and a single Black Vulture (*Aegypius monachus*) were imported within the Vultures Return in Bulgaria LIFE08 NAT/BG/278 Project. The birds were mostly secured from Spain and France, where their populations are abundant and stable. In addition to that, the project team secured several captive bred birds from zoos in France, Spain, the Czech Republic, Germany and the Netherlands.

Between 2010 – June 2015 a total of 205 different birds were released from the four adaptation aviaries maintained within the Vultures Return in Bulgaria LIFE08 NAT/BG/278 Project. In addition to this, pilot releases were carried out in Kotlenska Stara planina, releasing a total of 5 birds before the start of the project in 2009.

	Vrachanski Balkan	Central Balkan	Sinite kamani	Kotlenska planina	Total
2009	0	0	0	5	5
2010	8	8	7	7	30
2011	7	0	12	11	30
2012	5	15	19	7	46
2013	8	10	8	0	26
2014	11	19	16	10	54
2015	3	7	3	4	17
Average/year	7	10	9	6	30
Total	43	59	65	44	210

All vultures, released within the Vultures Return in Bulgaria LIFE08 NAT/BG/278 Project were marked with yellow PVC rings and matching wing-tags with black inscriptions, which allow the team to recognize them and follow their individual adaptation and behavior into the wild. At the same time, in order to track closely their exact movements and locate their favourite sites for roosting, foraging and even nesting, 11 of the vultures were tagged with radio transmitters, while 29 others were followed with GPS/GSM transmitters.

RESULTS

In June 2015, there are some 70 Griffon Vultures constantly present at the four release areas in the Balkan Mountains. Among them are permanently attracted exogenous birds, originating from nearby natural colonies.

Griffon Vultures released from the four sites in the Balkan Mountains have been observed in the following countries: Bulgaria, Greece, Serbia, Macedonia, Moldova, Romania, Turkey, Ukraine, Italy, Hungary, France, Poland and even Jordan.

The first breeding attempt of Griffon Vultures released within the Balkan Mountains restoration programme was reported as early as May 2012 in the Eastern Balkan Mountains, only three years after the very first pilot releases in 2009. At the same time, the very first confirmed baby Griffon Vulture hatched into the wild appeared in 2015, five years after the start of the releases in the area of the Vrachanski Balkan.

Year	Breeding areas	Number of pairs	Eggs	Hatched chicks
2012	1	1	1	0
2013	2	3	3	2?
2014	4	6	2 (3)	0
2015	5	12	2 (4)	1

Tagged birds have attempted breeding in three of the four release areas – Vrachanski Balkan, Sinite kamani-Grebents and Kotlenska Stara planina, as well as the Eastern Rhodopes, Bulgaria; Dadia Forest, Greece and Demir kapia, Macedonia.

The permanent presence of Griffon Vultures and the operation of the supplementary feeding sites have attracted a number of rare and threatened species in the area, such as Eurasian Black Vultures *Aegypius monachus*, Egyptian Vulture *Neophron percompterus*, White-tailed Eagle *Heliaetus albicilla*, Imperial Eagles *Aquila heliaca*, etc.