

BLACK VULTURES NESTING ON SKYSCRAPERS IN SOUTHERN BRAZIL

JAMES R. HILL, III

*Purple Martin Conservation Association
Institute for Research & Community Services
Edinboro University of Pennsylvania
Edinboro, Pennsylvania 16444 USA*

PEDRO SCHERER NETO

*Divisão de Museu de História Natural
Rua Benedito Conceição, 407
Curitiba, Parana, CEP 82500 Brazil*

Abstract.—The Black Vulture (*Coragyps atratus*), long known as an urban scavenger in South American cities, now nests on the window ledges and roofs of tall buildings in southern Brazil. Several examples of this unusual, new phenomenon are reported and it is shown that in some cases the vultures can be a nuisance to the humans inside the buildings, due to the objectionable odors they create. At one window-ledge nest, vulture nestlings spent many hours each day basking in the warm exhaust of an air conditioner unit, apparently to aid thermoregulation.

BUITRES ANIDANDO EN RASCACIELOS EN EL SUR DE BRASIL

Síntesis.—El buitre (*Coragyps atratus*), conocido por mucho tiempo como un carroñero urbano en ciudades de Sur América, al presente anida en el borde de ventanas y azoteas de rascacielos en Brasil. Informamos varios ejemplos de este poco usual y nuevo fenómeno, el cual en ocasiones puede ser de molestia para los humanos por la pestilencia causada por las aves. En el borde de una ventana, los polluelos de buitre pasaron muchas horas del día asoleándose en el extractor de una unidad de aire acondicionado, aparentemente para ayudar la termoregulación.

The Black Vulture (*Coragyps atratus*) is a nest-site opportunist known to nest in a wide range of situations. It nests in holes under rocks, on the floors of shallow caves, in narrow gullies, on the ground under dense or thorny vegetation, in the hollow bases of trees, stumps or fallen logs, on cliff ledges and in abandoned buildings (Jackson 1983). There is a report of Black Vultures nesting in the crannies of a high city building in Lima, Peru (Brown and Amadon 1968). Regarding the Lima observation, Amadon (pers. comm.) stated that in 1959, while on the street in that city, he observed vultures on a high building ledge and was told by his companion, the late Dr. Maria Koepcke, that they nested there. Since Amadon and Brown's report is the only published record of Black Vultures nesting on city buildings, we thought it appropriate to report on several additional examples of this unusual nesting behavior.

On 5 Feb. 1986, JRH observed two nestling Black Vultures on the 22nd floor window-ledge planter of a 23-story office building in downtown São Paulo, Brazil. This building was surrounded by tall condominiums and office buildings (Fig. 1). The dirt-filled, concrete planter ledge was 15 m long, 1.3 m wide, 12 cm deep, and was densely planted with ornamental bushes, plants and small trees. Office workers reported that



FIGURE 1. Two 110–120-d-old Black Vultures on the 22nd floor window-planter ledge of the skyscraper where they were hatched in metropolitan São Paulo, Brazil. Note their relative tameness as demonstrated by the proximity of the woman at the open window.

the young were hatched from eggs laid directly on the dirt floor of the planter about 10 cm from a concrete wall divider and directly under thick vegetation. Plate glass windows bordered the length of the ledge from floor to ceiling (Fig. 1). The bottom of the corresponding 23rd floor planter formed a protective ceiling about 3.5 m above the planter ledge. To get a closer look at the nest site, JRH crawled out onto the ledge through a window. A scattering of white fecal material covered the entire surface of the ledge, and the spot where the vultures reportedly were hatched contained a thoracic vertebra of a medium-sized dog. Despite being approached to within 4 m, the young seemed unalarmed and made no attempt to escape. Their plumage appeared completely adult-like except for a small amount of white, natal down attached to the dark feathers at the top of their neck ruffs.

Office workers reported that the adult birds still fed the young daily and that the young had been flying for over a month, but never farther than the 12 m out and back to a nearby television antenna where they frequently perched. Extrapolating from the growth figures and photographs of McHargue (1981), and the approximate time since the birds

took their first flight, we judged the young to be 110–120 d old at the time JRH observed them. These young may have been the product of renesting by the adults. Initially, a two-egg clutch was laid on the ledge, but after both eggs broke due to human interference, the adults disappeared. About a month later, a pair of adults (the same?) returned and laid another clutch of two eggs, 2 m from where the first clutch had been laid.

According to the office workers, when the nestlings were still covered with a buff-colored coat of down feathers, they often scrambled along the ledge from their hatching spot and entered a 6-m long, 33-cm wide horizontal pipe, which was flush with the flowerbed and functioned as a fresh air duct for the floor below. The stench from the birds using both the ventilation pipe and the planter ledge became so unbearable to the office workers on both the 21st and 22nd floors that they blocked the pipe to prevent its further use and were forced to keep their windows closed. The young vultures spent most of each day sitting in the hot air exhaust of the 22nd floor's air-conditioning unit. As the nesting ledge was on the south face of the building and received no direct sunlight, the young had no opportunity to absorb solar energy in their characteristic spread-winged posture to assist in raising their body temperatures after bouts of nocturnal hypothermia (see Kushlan 1973, Laroche et al. 1982, McHargue 1981.) To compensate, it appears they took advantage of the heat coming from the air conditioner exhaust. This is similar to the report by Townsend (1937) of adult Black Vultures sitting around chimney pots and on chimneys during cold weather.

Three other occurrences of Black Vultures nesting on skyscrapers were documented by PSN in Curitiba, Brazil. In September 1982, he observed a nesting on the 19th floor window-ledge planter of the Arco Verde condominium. In this nesting, two eggs were laid on the bare dirt of a small (80 cm by 60 cm), unplanted, window-ledge planter and two vultures fledged successfully. This planter ledge also faced south, but had no air conditioner exhaust blowing on it. The second nesting documented by P. S. N. Scherer was in late 1986 and was within a roof recess of a tall Curitiba building. Two eggs were laid, but only one young hatched and fledged. The third nesting was in 1987 and was in the same roof recess as the 1986 nesting.

Skyscraper-nesting by the Black Vulture appears to be common in Brazil. According to Dr. Werner Bokermann, Curator of Birds at the São Paulo Zoo and Dr. Lázaro Puglia, Director of the Sorocaba Zoo (pers. comm.), nestling Black Vultures are commonly brought into their facilities by the general public who report finding them on the window ledges of city buildings or underneath large roof-mounted water storage tanks.

The Black Vulture has benefited immensely from human post-Columbian colonization of the New World (Sick 1985). By feeding on the garbage of dumps, fish killed in polluted waters, livestock dying in pastures and animals killed along highways, the Black Vulture's numbers have

increased so dramatically that it is now considered the most abundant bird of prey in the Western Hemisphere (Brown and Amadon 1968). The Black Vulture's population should continue to increase along with that of humans. As its traditional nesting sites become more and more limited, the increasing use of skyscrapers as nesting sites by Black Vultures should be expected, due to the similarities that large, unkempt window planters and roof recesses have to natural cliff ledges and caves.

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