

Short communication*(Nota científica)***RECORD OF AN ALLEGED SOLITARY EAGLE IN OAXACA IS A GREAT BLACK HAWK****PRESUNTO REGISTRO DE UN ÁGUILA SOLITARIA EN OAXACA ES UNA AGUILILLA NEGRA MAYOR****WILLIAM S. CLARK¹, JACK CLINTON-EITNIEAR², RYAN A. PHILLIPS³**¹2301 south Whitehouse Circle, Harlingen, Texas 78550 USA. <raptours@earthlink.net>²218 Conway Drive, San Antonio, Texas 78209 USA. <jce@cstbinc.org>³Belize Bird Conservancy P.O. Box 110234 Campbell, California 95011 USA. <harpiabz@yahoo.com>

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ABSTRACT. In a recent article in this journal (García-Grajales *et al.*, 2018), an adult Great Black Hawk (*Buteogallus urubitinga*) was mistakenly identified as an adult of the Solitary Eagle (*Buteogallus solitarius*). The Solitary Eagle differs from the Greater Black Eagle in having the longest and widest wings, and the shortest tail. These characteristics give it a more triangular shape in flight. These differences are easy to see in Figures 1–3. The same authors also cite a case of the nesting of the Solitary Eagle in Mexico (Smith, 1982). However, after reviewing photos of the young, we consider that this record is probably the Common Black Hawk (*B. anthracinus*). The illustrations of the Solitary Eagle in field guides of Mexico and Central America (Howell & Webb, 1995; Van Perlo, 2006) demonstrate greater similarity with the Great Black Hawk, contributing to the frequent confusion of the two species if used without consulting the text. The new features published here and in Clark *et al.* (2006) and Clark and Schmitt (2017) should help with correct identification of *Buteogallus* species in the future.

Clark, W. S., Clinton-Eitniear, J., Phillips, R. A. (2020) Presunto registro de un Águila Solitaria en Oaxaca es una Aguililla Negra Mayor. *Acta Zoológica Mexicana (nueva serie)*, 36, 1–6.
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RESUMEN. En un artículo reciente en esta revista (García-Grajales *et al.*, 2018), un adulto del Aguililla Negra Mayor (*Buteogallus urubitinga*) fue identificado erróneamente como un adulto del Águila Solitaria (*Buteogallus solitarius*). El Águila Solitaria difiere del Aguililla Negra Mayor en tener las alas más largas y anchas, y la cola más corta. Estas características le confieren una forma más triangular en el vuelo. Estas diferencias son fáciles de apreciar en la Figuras 1–3. Los mismos autores también citan un caso del anidamiento del Águila Solitaria en México (Smith, 1982). Sin embargo, después de revisar fotos de las crías, consideramos que este registro probablemente se trata del Aguililla Negra Menor (*B. anthracinus*). Las ilustraciones del Águila Solitaria en guías de campo de México y Centroamérica (Howell & Webb, 1995; Van Perlo, 2006) demuestran mayor similitud con el Aguililla Negra Mayor, contribuyendo a la



confusión frecuente de las dos especies si se utilizan sin consultar el texto. Las nuevas características publicadas aquí y en Clark *et al.* (2006) y Clark y Schmitt (2017) deben ayudar a su correcta identificación en el futuro.

A Great Black Hawk (*Buteogallus urubitinga*) adult was misidentified from photographs as an adult Solitary Eagle (*Buteogallus solitarius*) by García-Grajales *et al.* (2018) in a recent article in this journal. Solitary Eagles have a different wing shape and tail length from Great Black Hawks, shown well in Clark *et al.* (2006), the illustration reproduced here in as figure 1, and Clark and Schmitt (2017), plate 15 and plate captions reproduced herein as figures 2b and 2a. One can compare the photos in García-Grajales *et al.* (2018) with the illustrations and photos in Clark *et al.* (2006) and Clark and Schmitt (2017), figures 1–3, and see that the wing shape of the eagle (3b in Figure 2b) is much wider and more triangular, compared to that of a Great Black Hawk (2a in Figure 2b); Great Black Hawk wings in flight show leading and trailing edges that are parallel. Also, the wings of a Solitary Eagle are noticeably longer, and the tail length is noticeably shorter than those of a Great Black Hawk, both of which are evident in the field, in figures, and in photographs. The photos in García-Grajales *et al.* (2018) clearly show characters of Great Black Hawk of longer tail extending far beyond wings and wings more parallel and not triangular. When compared side by side, these differences are easier to see, which can be done with our series of similar angled photos of Solitary Eagles in flight for comparison (Figure 3) with the photos in García-Grajales *et al.* (2018). Great Black Hawk have barred thigh feathers and Solitary Eagles do not. The photo in García-Grajales *et al.* (2018) (lower left) shows barred thigh feathers clearly. Finally, note the longer primaries (“fingers”) on the outer wings of Solitary Eagles, not shown by the adult in the photos in García-Grajales *et al.* (2018); these are very short. None of the photos of the alleged eagle in Garcia-Gracias *et al.* (2018) are taken of its uppersides, where the white uppertail coverts would have been obvious (See 2b in Figure 2b). These coverts on Solitary Eagle are black (3b in Figure 2b). We contacted two Mexican raptor identification experts, Jorge Montejo and Ernesto Ruelas, who both agreed that the adult in the photos of Garcia-Grajales *et al.* (2018) is a Great Black Hawk.



Figure 1. Soaring silhouettes of adult and juvenile Solitary Eagles, showing triangular wing shapes. Reproduced here with editor’s permission from Clark *et al.* 2006. Illustration by John Schmitt.



PLATE 15

BUTEOGALLUS ADULTS

Three large to huge slate-gray buteonines with broad wings. All soar regularly.

1 COMMON BLACK HAWK

Buteogallus anthracinus PAGE 172

Smallest Buteogallus. Two subspecies: *nominata* widespread and *B. a. subtilis* (Mangrove Black Hawk), the latter only mixing in e Panama. Usually found near bodies of water, especially coastal mangroves.

a. Adult. Overall slate-gray, with noticeable white slashes at base of outer three primaries and grayish mottling and wide dark terminal band on the flight feathers. Legs extend only to narrow white tail band. Orange on cere extends onto base of bill. Note rounded corners of tail tip, unlike 3a, and wings pushed forward when soaring.

b. Juvenile in molt. They show a mix of new adult and old juvenile feathers.

c. Adult *subtilis*. Like nominate adult but with strong rufous wash on remiges.

d. Adult female head. Like adult male but usually with whitish area from lores to under the eyes.

e. Adult. Overall dark slate-gray with noticeable grayish on uppersides of flight feathers and narrow white tail band. Uppertail coverts are black, unlike those of 2c and 2d.

f. Adult male. Overall dark slate-gray. Orange on adults' cere extends onto base of dark bill, unlike 2e and 2f. Wingtips fall just short of tail tip, unlike those of 2f and 3d. Note grayish on folded secondaries. Legs are noticeably shorter than those of 2f. Males lack white areas under the eyes.

g. Adult *subtilis*. Like nominate adult but with strong rufous wash on remiges.

2 GREAT BLACK HAWK

Buteogallus urubitinga PAGE 176

Medium-sized Buteogallus. Two subspecies: *nominata* in e Panama and *B. u. ridgwayi* otherwise throughout. Usually found in wet grasslands, but also in rain forest.

a. Adult *ridgwayi*. Overall dark slate-gray, lacking white slashes at base of outer three primaries and with banding and less noticeable wide dark terminal band on the flight feathers. Wings are narrower than those of 1a and 3a, with front and back edges more parallel. Legs extend beyond tail band and almost to tip. Beak is entirely black. White barring on leg feathers

is sometimes noticeable. Second narrow white tail band is usually covered by undertail coverts.

b. Adult *nominata*. Like *B. u. ridgwayi*, but the entire base of the tail is white. (Uppertail coverts are slate-gray on 1e.)

c. Adult *ridgwayi*. Overall slate-gray, with subtle grayish banding on uppersides of flight feathers and white tail band and white uppertail coverts (slate-gray on 1e).

d. Adult *nominata*. Like 2b, but the entire base of the tail is white, and the legs feathers lack white barring.

e. Older immature. During their second molt, they have a mix of new dark slate-gray adult and old immature feathers. Tail is adult-like.

f. Adult *ridgwayi*. Overall dark slate-gray. Bill is entirely black, and cere is yellow, unlike those of 1e. Leg feathers are narrowly barred white. Wingtips barely extend beyond folded secondaries. Note narrow grayish banding on folded secondaries. Legs are noticeably longer than those of 1f.

3 SOLITARY EAGLE

Buteogallus solitarius PAGE 180

Huge Buteogallus with very broad triangular wings that make the tail appear short. Extremely rare and local in hilly and mountainous areas.

a. Adult. Overall dark slate-gray, with wide dark terminal band on grayish, usually unbanded flight feathers. Wings are rather triangular. Legs almost reach tail tip. Corners of tail tip are square, unlike rounded as shown on 1a.

b. Adult. Overall more grayish on uppersides, especially the remiges, compared to 1e and 2c, with a narrow white band on blackish tail. Wide wings are rather triangular, and tail barely extends beyond wings.

c. Older immature. Immatures that are almost adult are overall dark blackish-brown with some buffy markings and adult tail and some pale areas on their heads. Wingtips extend beyond tail tip.

d. Adult. Overall dark slate-gray. Bill is entirely black. Note faint banding on folded grayish secondaries and the long legs. Wingtips extend beyond tail tip.

Figure 2a. Captions for Plate 15, *Buteogallus* adults. Reproduced here with editor's permission from Clark and Schmitt 2017.



Figure 2b. *Buteogallus* adults. Plate 15. Reproduced here with editor's permission from Clark and Schmitt 2017. Illustration by John Schmitt.

We compared the photos in García-Grajales *et al.* (2018) to the illustrations in Howell and Webb (1995) and van Perlo (2006) and, if these guides were used, understand why the adult in the photos were misidentified. The eagle illustrations in those guides are more similar to Great Black Hawk than to Solitary Eagle; one can see this by comparing these illustrations with those showing correct wing shapes in Clark *et al.* (2006) and illustrations and photographs in Clark and Schmitt (2017).



García-Grajales *et al.* (2018) also cited an alleged nesting of a Solitary Eagle in Mexico by Smith (1982). One of us (WSC) has seen photos of the nestling, which showed darkly barred leg feathers. These feathers are solidly dark on nestling and juvenile Solitary Eagles. Smith's nest record is most likely that of a Common Black Hawk (*Buteogallus anthracinus*).

Two of us (WSC and RAP) have observed many Solitary Eagles in flight in Mexico, Belize, and Peru, as well as hundreds of Great and Common Black Hawks in many countries. Furthermore, we two have reviewed hundreds of alleged Solitary Eagle or *Buteogallus* photos. We conclude that the published photos in García-Grajales *et al.* (2018) are of an adult Great Black Hawk.

Great Black Hawks and Common Black Hawks are regularly misidentified as Solitary Eagles. Therefore, caution should be taken when identifying Solitary Eagles, especially when documented outside of its known range. It is now possible to correctly identify Solitary Eagles in the field using the newly published characteristics (Clark *et al.*, 2006; Clark & Schmidt, 2017). It is important to have correct identification of the species involved for records like this.



Figure 3. Solitary Eagle in flight photographs for comparison to similar angles of the Great Black Hawk in García-Grajales *et al.* (2018). Photos taken in Belize by Ryan A. Phillips.

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