Speothos venaticus. By Beatriz de Mello Beisiegel and Gerald L. Zuercher
Published 20 December 2005 by the American Society of Mammalogists

Speothos Lund, 1839
Speothos Lund, 1839:224. Type species Speothos pacivorus Lund, 1839, by monotypy.
Cynogale Lund, 1842:203. Type species Cynogale venatica Lund, 1842, by monotypy; preoccupied by Cynogale Gray, 1837.
Abathomdon Lund, 1843:74. Type species not given.
Cynalycus Gray, 1846:293. Type species Cynalycus melanogaster Gray, 1846, by monotypy.
Melictis Schinz, 1848:177. Type species Melictis beskii Schinz, 1848, by monotypy.
Melites Gray, 1868:496. Incorrect subsequent spelling of Melictis Schinz, 1848.

CONTEXT AND CONTENT. Order Carnivora, suborder Caniformia, family Canidae, subfamily Caninae (Stains 1984). The species are recognized:

Speothos venaticus (Lund, 1842) Bush Dog
Cynogale venatica Lund, 1842:203. Type locality “Lagoa Santa, Minas Gerais, Brazil.”
Cynalycus melanogaster Gray, 1846:293. Type locality “Brazils.”
Melictis beskii Schinz, 1848:177. Type locality “Nova Friburgo, Estado do Rio de Janeiro, Brazil.”
Speothos venaticus: Thomas, 1903:236. First use of current name combination.
Speothos wingei Hering, 1911:222. Type locality “Estado de Santa Catarina, Colônia Hansa, Brazil.”
Icticyon panamensis Goldman, 1912:14. Type locality “Cerro Pierre, Panama.”

CONTEXT AND CONTENT. Context as above. Three subspecies are recognized:
S. v. panamensis (Goldman, 1912:14); see above.
S. v. venaticus (Lund, 1842:203); see above; baskii (Shinz) and melanogaster (Gray) are synonyms.
S. v. wingei Hering 1911:222; see above.

DIAGNOSIS. Atelocynus microtis and Speothos venaticus overlap geographically in the Amazonian regions of Brazil, Colombia, Ecuador, and Peru. S. venaticus is distinguished from A. microtis by absence of M3 and absence of metaconid and entoconid on M1 and M2. S. venaticus has interdigital webbing and a carnassial ridge that A. microtis lacks. S. venaticus has shorter legs and tail than A. microtis and has paler pelage around head and neck. Head of S. venaticus is mustelid like, whereas head of A. microtis is fox-like (Vieira 1946).

GENERAL CHARACTERS. Speothos venaticus (Fig. 1) is a small canid (body mass, 4–7 kg) with short legs and tail, interdigital membranes, elongated body, and small rounded ears (Vieira 1946). Color ranges from uniform dark brown to yellowish red, with lighter color on neck, nape of neck, and ears (Sheldon 1992) and darker color on limbs, tail, and ventrum (Gombrich-Filho 1972). Young animals are uniformly black (Darling and Whitehead 1991). Bush dogs lack facial markings. Skull is short (Fig. 2; Vieira 1946). S. v. panamensis is smaller than S. v. venaticus and S. v. wingei, which are similar in size (Linares 1967). S. v. panamensis and S. v. wingei are light-colored compared with S. v. venaticus (Linares 1967).

Measurements (ranges, in mm) of S. v. wingei: length of head and body, 730–740 (n = 3); length of tail, 110–150 (n = 3); total length of skull, 132–133 (n = 2); palatal length, 61–63 (n = 2); zygomatic width, 80–81 (n = 2); braincase width, 46–47 (n = 2); interorbital width, 24 (n = 2); length of mandible, 102–102.5 (n = 2—Vieira 1946). Measurements (in mm) of 1 adult male S. v. panamensis are length of head and body, 730; length of tail, 105; length of hind foot, 110; length of ear, 35; length of skull, 120; condylobasal length, 124; palatal length, 61.5; basal length, 116.5; nasal length, 29.5; interorbital width, 31.6; supraorbital width, 39.8; postorbital width, 26.5; zygomatic width, 75.8; length of mandible, 91 (Linares 1967).

DISTRIBUTION. Speothos venaticus occurs from Panamá to southern Brazil, Paraguay, and northern Argentina, extending west to Bolivia, Peru, and Ecuador (Fig. 3; Cabot et al. 1986; Cabrera and Yepes 1940; Linares 1967; Yahne et al. 1996). S. v. venaticus is widely distributed in northern South America (Eisenberg 1989), with fewer reports from southeastern (São Miguel Arcanjo–Beisiegel 1999; São Joaão da Boa Vista–Carvalho 1980) to southern Brazil (Gimardi 1996; Ihering 1911). S. v. panamensis occurs in southwestern North America; S. v. venaticus occurs in the Amazon River basin, central Brazil, eastern Bolivia, northern Paraguay, northeastern Peru, eastern Ecuador and the Guianas; and S. v. wingei occurs in southeastern Brazil (Linares 1967). Bush dogs occur from low elevations (Eisenberg 1989) to 1,900 m altitude (R. Wallace, pers. comm.).

FOSSIL RECORD. Speothos originated from canids that evolved in the Brazilian highlands (Berta 1984; Langguth 1975). Speothos pacivorus (extinct species) and Speothos venaticus occur in the late Pleistocene (300,000 years ago)—Recent deposits from Lagoa Santa Caves, Brazil (Berta 1984, 1967).

FORM AND FUNCTION. Bush dogs are a highly specialized lineage of South American canids that evolved for dwelling in forests (Langguth 1975). They have partially webbed feet (Mardonald 1996) adapted for walking on soft soil near streams. Bush dog tracks and stride in the field are as follows: forefeet: 5.7 by 5.4 cm; hind feet, 5.0 by 4.4 cm; stride, 26 cm (Villalba and Yahnke 1998). Bush dog dentition, specifically the reduced number of molars, indicates a highly carnivorous diet (Flower 1880). Dental for-