

NOTEWORTHY RECORDS OF THE LITTLE POCKET MOUSE
(HETEROMYIDAE: *PEROGNATHUS LONGIMEMBRIS*) ON THE
BAJA CALIFORNIA PENINSULA

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The little pocket mouse, *Perognathus longimembris*, occurs throughout the Great Basin and Mojave deserts of the western United States, with a limited distribution in northwest-

ern Mexico (Hall, 1981; distribution in San Joaquin Valley of California based on misidentified specimens of *P. inornatus*, according to Williams et al., 1993). Four subspecies have

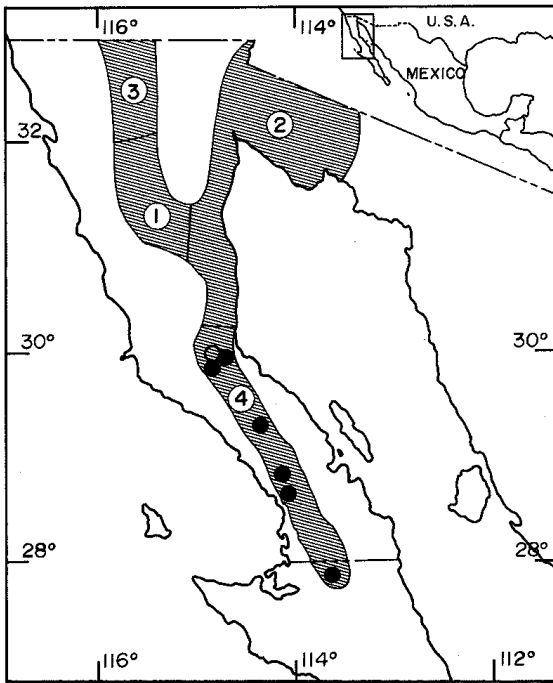


FIG. 1.—Distribution of the known subspecies of *Perognathus longimembris* from Baja California Peninsula: 1) *P. l. aestivus*, 2) *P. l. bombycinus*, 3) *P. l. internationalis*, and 4) *P. l. venustus*. The type locality, San Agustín (open circle), and all the new recorded localities (solid circles) are plotted for *P. l. venustus*.

been described from the Baja California Peninsula (Hall, 1981; Patton and Alvarez-Castañeda, 1999): *P. l. internationalis* from the San Felipe and La Puerta valleys of Baja California and adjacent California (Huey, 1939); *P. l. aestivus* from the western base of the Sierra Juárez (Huey, 1928); *P. l. bombycinus* from the northern end of the Gulf of California (Osgood, 1907); and *P. l. venustus*, known only from 3 specimens from the type locality, San Agustín (Huey, 1939). Williams et al. (1993) questioned the subspecific distinction of *P. l. venustus* apart from *P. l. aestivus*, based only on the much darker color of the former (Huey, 1939). On the basis of its limited distribution in the northern peninsula, Hafner and Riddle (1997) considered *P. longimembris* to be a recent arrival to the peninsula of indeterminate origin (i.e., either from coastal California or from the Mojave Desert). Figure 1 illustrates the known distributions of these 4 subspecies.

On 20 October 1997, we collected 1 *P. longimembris* at 14 km S, 41 km E Guerrero Negro, Baja California Sur, in the Desierto del Vizcaí-

no Biosphere Reserve. This location extends the known distribution of the species (and the genus *Perognathus*) 260 km southeast along the Baja California Peninsula. D. J. Hafner and B. R. Riddle (pers. comm.) reported collecting 1 *P. longimembris* from 27 km S Punta Prieta, 150 km south of the previous southernmost record, on 29 October 1997. Subsequently, in the course of a survey of the protected area of the Valle de los Cirios Reserve during February and March 1998, we captured additional specimens from near the type locality of *P. l. venustus* (San Agustín), and from geographically intermediate localities (relative to the new records), that document a relatively continuous distribution of the species throughout the state of Baja California and into Baja California Sur.

Specimens ($n = 16$) collected from the following locations (skin and skull, skin and skeleton, or skull only, all including frozen tissue samples) are deposited in the Centro de Investigaciones Biológicas del Noroeste (CIB) or the New Mexico Museum of Natural History (NMMNH): Baja California Sur: 14 km S, 41 km E Guerrero Negro (CIB 1740); Baja California: 26 km N, 14 km W Cataviña (CIB 2384–2388); 24 km N, 20 km W Cataviña (CIB 2389); Laguna Chapala, 431 m (CIB 2390); 0.5 km N, 2 km W Punta Prieta, 243 m (CIB 2391); 27 km S Punta Prieta, 118 m (CIB 2899–2902, NMMNH 2795, 2977–2978).

Mean measurements (and ranges) of 8 specimens from near the type locality of San Agustín (2 localities NW of Cataviña), 6 from 27 km S Punta Prieta (CIB), and 1 skull only specimen from southeast of Guerrero Negro (in mm) are: total length, 140.0 (136 to 147), 130.0 (125 to 139); —; tail length, 70.7 (68 to 77), 68.5 (64 to 76), —; hind foot length, 20.0 (19 to 21), 18.3 (17 to 19), —; ear length, 6.9 (6 to 8), 6.3 (6 to 7), —; total length of skull, 23.0 (22.3 to 23.6), 21.1 (19.9 to 21.8), 23.1; interorbital breadth, 5.2 (4.9 to 5.3), 4.8 (4.6 to 4.9), 5.1; length of nasals 8.2 (7.9 to 8.6), 7.4 (6.7 to 7.8), 8.1; breadth of nasals, 2.1 (1.9 to 2.2), 2.0 (1.8 to 2.2), 2.1; maxillary tooth row, 3.0 (2.8 to 3.2), 2.8 (2.4 to 3.1), 2.8.

Pending additional specimens and a more comprehensive analysis of geographic variation among populations of *P. longimembris* on the Baja California Peninsula, we provisionally assign these additional specimens to the geographically closest subspecies, *P. l. venustus*. All

external and cranial measurements for the 16 specimens are similar to those of the 2 topotypes (San Diego Museum of Natural History 8129 and 8519) of *P. l. venustus*. Specimens from near the type locality share a reddish pelage coloration with the 2 topotypes; the specimens from 27 km S Punta Prieta are of a more gray color; no skin is available from southeast of Guerrero Negro. With addition of these new records, the distribution of *P. l. venustus* includes all of the Valle de los Cirios Reserve in the central desert of Baja California and Baja California Sur, from San Agustín in the north to southeast of Guerrero Negro in the south.

All localities reported herein, and included within the expanded range of *P. l. venustus*, are within the Vizcaíno Desert Subregion (Roberts, 1989), which is characterized by low, scanty, and widely spaced vegetation due to constant strong winds from the Pacific Ocean. Climate for the area is warm and dry, with a mean annual temperature of 20°C and <15 cm annual precipitation, most of which occurs during winter. The area in the vicinity of the type locality (San Agustín) is dominated by scrub vegetation including creosote bush (*Larrea divaricata*), white ratany (*Krameria grayi*), agave (*Agave*), mesquite (*Prosopis globosa*), ocotilla (*Fouquieria diguetii*), huizapol (*Ambrosia ambrosoides*), cacti, grasses, and scattered yucca (*Yucca valida*), boojum trees (*Idria columnaris*), and cholla (*Cholla*). In the Vizcaíno Desert, dominant species are stonecrop (*Dudleya albiflora*), spurge (*Euphorbia misera*), wild buckwheat (*Eriogonum fasciculatum*), and slipper plant (*Pedilanthus macrocarpus*). Other rodent species caught in the general vicinity along with specimens of *P. longimembris* included *Chaetodipus arenarius*, *C. baileyi*, *C. fallax*, *Dipodomys merriami*, *D. simulans*, *Neotoma lepida*, and *Peromyscus eremicus*.

Resumen—Se registra la segunda serie de ejemplares de la localidad típica de *Perognathus longimembris venustus*, se amplía la distribución de la subespecie en 260 km dentro del estado de Baja California y se registra por primera vez para Baja California Sur. Se realizan compara-

ciones con los ejemplares de las subespecies previamente descritas para la península no encontrando características que permitan su diferenciación subespecífica.

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