

bears a few erect hairs. Mandibles scarcely darker than the head; mesonotum often streaked with brown. Wings colored like those of the female.

The types of this species, which is easily recognized by the red color of all the phases, came from the Carolinas and Pennsylvania. I have seen no specimens from British America or from any portion of the Union west of the one hundredth meridian. Mayr's citation of specimens of this or the following subspecies from California, Colorado and New Mexico is very questionable. The material before me represents the following localities:

North Carolina: Belmont (Jerome Schmitt); Raleigh (F. Sherman).

Maryland: Chestertown (H. Viereck); Georgetown, D. C. (E. G. Titus).

Virginia: Ashland (J. F. McClendon).

Florida: (Amer. Mus. Nat. Hist.).

Louisiana: Mansfield (R. C. Howell).

New Jersey: Caldwell (E. T. Cresson); Sea Isle City (H. Viereck); Fort Lee (W. Beutenmueller and Wheeler); Great Notch (Wheeler).

New York: West Farms (J. Angus).

Connecticut: Westville (W. E. Britton).

Massachusetts: Cambridge (Mus. Comp. Zool.).

Indiana: Bass Lake, Hammond and Mount Vernon (W. S. Blatchley).

Although thus widely distributed through the eastern half of the Union, *C. castaneus* seems nowhere to be common except, perhaps, in the South Atlantic states. It forms moderately populous colonies, which nest in the ground under stones in open woods, in the same manner as the species of the *maculatus* group. The workers are very timid and probably nocturnal.

22. *C. castaneus americanus* Mayr

C. americanus MAYR, Verh. zool. bot. Ges. Wien, XII, p. 661, ♂ ♀, 1862.

C. castaneus MAYR; *Ibid.*, XXXVI, p. 420, 1886; DALLA TORRE, Catalog. Hymen., VII, p. 223, 1893.

C. castaneus subsp. *americanus* EMERY, Zool. Jahrb. Abth. f. Syst., VII, p. 674, ♂ ♀ ♂, 1893; WHEELER, Bull. Amer. Mus. Nat. Hist., XXI, p. 402, 1905; Occas. Papers Bost. Soc. Nat. Hist., VII, 7, p. 22, 1906.

This subspecies, as Mayr and Emery have observed, is highly variable in color, and this is true of individuals of the same colony. The only features in which it seems always to differ from the typical *castaneus* are the deeper and more elongate foveolæ on the cheeks of the major workers and the coloration of the head, which is black or dark brown in all four phases, with the mandibles, clypeus and cheeks more or less brown or reddish. The thorax, gaster, legs and antennæ of the worker major may be dirty or clay-yellow throughout, but usually the dorsal surface of the thorax, especially of the mesonotum, and a