

Magdalena: Tayrona National Park, Cañaveral, 11°19'N, 073°56'W, 200 m, dry forest, 11 Aug 1985 (J. Longino); El Recuerdo, 3 km SE Minca, 11°08'N, 074°06'W, 1050 m, wet forest, 13 Aug 1985 (J. Longino); COSTA RICA: Guanacaste: Bosque Humedo, Santa Rosa Nat. Park, 10°51'N, 085°37'W, 300 m, 12 Jul 1985 (J. Longino); Heredia: La Selva Biological Station, 10°24'59"N, 084°01'12"W, 50 m, mature wet forest, 14 Jun 2004 (M Molina, D Alvarez, G Hurtado); 7 km SW Pto. Viejo, 10°24'14"N, 084°02'22"W, 160 m, 15 Jun 2005 (M Molina/ D Alvarez/ G Hurtado); 16 km SSW Pto. Viejo, 10°19'03"N, 084°02'56"W, 500 m, 18 Apr 2006 (Marcos M, Gilberth H, Felix C); 11 km SE La Virgen, 10°20'N, 084°04'W, 500 m, montane wet forest, 14 Feb 2003 (ALAS); 16 km SSE La Virgen, 10°16'N, 084°05'W, 1100 m, 19–22 Mar 2001 (ALAS); Limón: Hitoy Cerere Biol. Reserve, 09°40'N, 083°02'W, 500 m, 30 Aug 1985 (J. Longino); Puntarenas: Sirena, Corcovado National Park, 08°29'N, 083°36'W, 5 m, 18 Dec 1990 (J. Longino); 13 km SSW Pto. Jimenez, 08°24'24"N, 083°19'42"W, 130 m, tropical rainforest, 10 Mar 2008 (J. Longino); 15 km SSW Pto. Jimenez, 08°24'29"N, 083°19'39"W, 170 m, mature wet forest, 7 Mar 2010 (J. Longino); GUATEMALA: Izabal: 5 km NW Morales, 15°30'44"N, 088°51'44"W, 215 m, 2° lowland rainforest, 18 May 2009 (LLAMA); Petén: Parq. Nac. Tikal, 17°14'28"N, 089°37'20"W, 270 m, tropical moist forest, 23 May 2009 (LLAMA); Cerro Cahuí, 17°00'08"N, 089°43'02"W, 270 m, 24 May 2009 (LLAMA); 13 km NW Machaquilá, 16°26'47"N, 089°32'56"W, 400 m, 27 May 2009 (LLAMA); Zacapa: 8.5 km NE Tuculután, 15°03'31"N, 089°40'35"W, 1100 m, pine oak forest, 6 Jul 2007 (M. Branstetter); HONDURAS: Atlantida, San Juan Pueblo, 15°35'N, 087°14'W (W. M. Mann); MEXICO: Chiapas: 8 km SE Salto de Agua, 17°30'53"N, 092°17'56"W, 100 m, 2° wet forest, 16 Jun 2008 (M. Branstetter); Playón de la Gloria, 16°09'33"N, 090°54'06"W, 160 m, lowland wet forest, 26 Jun 2008 (LLAMA); 21 km SW Salto de Agua, 17°23'08"N, 092°25'41"W, 180 m, 2° wet forest, 15 Jun 2008 (LLAMA); Lago Metzabok, 17°07'32"N, 091°37'51"W, 570 m, lowland wet forest, 6 Jun 2008 (LLAMA); Nahá, 16°56'56"N, 091°35'42"W, 930 m, mesophil forest, 8 Jun 2008 (LLAMA); VENEZUELA: Aragua: Ocumares de la Costa, 10°27'36"N, 067°46'35"W, 70 m, secondgrowth dry forest, 13 Aug 2008 (J. Longino).

Megalomyrmex symmetochus Wheeler

(Figs 1B, 3A, 3C)

Megalomyrmex symmetochus Wheeler, W.M. 1925: 168, fig. 5. Lectotype worker (designated by Brandão, 1990: 445): Barro Colorado Island, Panama, July 1924 (Wheeler) [MCZ] (not examined). Wheeler, 1925: 168, description of queen, male. Wheeler, G. & Wheeler, J., 1955: 126, description of larva. See also: Brandão, 1990: 445.

Measurements. Worker: HW 0.60–0.84, HL 0.75–0.89, SL 0.72–0.82, EL 0.21–0.25, ML 1.03–1.31, CI 88–95, SI 90–93 (n=30, from Brandão, 1990; n=5, current study).

Geographic range. Costa Rica to Panama.

Biology. This species appears to be a specialized associate of small Attini (Wheeler 1925, Brandão 1990, Adams *et al.* 2000), a habit shared with other species of *Megalomyrmex* such as *wettereri*, *mondabora*, and *adamsae*. As defined here, *M. symmetochus* specializes on *Sericomyrmex amabilis* Wheeler. Wheeler (1925) found numerous colonies nesting with *Sericomyrmex* on Barro Colorado Island, Panama. He observed a number of colonies in the lab, and made the following observations (in Wheeler's account *M. symmetochus* is referred to as *Cepobroticus* Wheeler, a subgenus erected by Wheeler to contain the single species *M. symmetochus*, later synonymized with *Megalomyrmex* by Ettershank [1966]):

“The colonies of the *Cepobroticus* so frequently found living with *Sericomyrmex amabilis* were decidedly less populous than those of their host. The largest comprised less than 75 individuals, and often the number did not exceed 40 or 50. In every nest a dealated mother queen was present. She usually took up her station, surrounded by a group of her workers, in one of the crypts of the fungus garden a short distance - half to three quarters of an inch - from the *Sericomyrmex* queen. The guest ants kept their brood in small clusters scattered through the garden and each cluster was cared for by a few workers. Although the ants and their brood were thus intermingled, the workers of each species lavished their attention exclusively on their own eggs, larvae and pupae and were never seen even to transport the progeny of the other species from one part of the garden to another.

The workers and queens of *Cepobroticus* are rather alert and move about more rapidly than their hosts. They devote so much time to licking and fondling one another that the observer is somewhat astonished to find