

# New distributional data concerning some Gerromorpha (Insecta: Hemiptera: Heteroptera) from Brazil

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**ABSTRACT:** Distributional information is provided for 51 Gerromorpha species from Brazil, including first species records from the states of Alagoas, Paraíba, and Sergipe. *Hydrometra comata*, *Microvelia pinguaba*, *M. ubatuba*, and *Rhagovelia robusta* are newly recorded from the Northern region of Brazil; *Mesovelia amoena*, *Husseyella halophila*, *Microvelia longipes*, *M. mimula*, *M. venustatis*, *Rhagovelia hambletoni*, *R. mangle*, *R. robusta*, and *R. whitei*, from the Northeastern region; *Cylindrostethus erythrops* and *Rhagovelia rivulosa*, from the Central-Western region; *Mesovelia bila*, from the Southeastern region; and *Oiovelia brasiliensis* and *Rhagovelia sooretama*, from the Southern region. Additional new records and distributional information are provided.

The semiaquatic bugs of the infraorder Gerromorpha are small to mid-sized insects, usually found above the surface or on the margins of freshwater bodies (Andersen 1982). They can also be collected on some other environments, such as mangroves, pockets of bromeliads, forest litter, and even in open sea (Andersen and Polhemus 1980; Polhemus and Polhemus 1991; Zettel 2004; Cheng 2006).

The gerromorphan fauna from Brazil has been target of many taxonomic and faunistical studies since the 1970's (e.g. Nieser 1970a, b, 1994; Nieser and Melo 1999; Melo and Nieser 2004; Moreira and Ribeiro 2009), but large areas of the country remain virtually unstudied (Moreira *et al.* 2011b). Based on the information published until July, 2010, Moreira *et al.* (2011b) listed 187 species of Gerromorpha from Brazil, and a few studies have already added new species and distributional information to their list (e.g. Moreira and Barbosa 2011; Moreira *et al.* 2011a).

The examination of specimens of Gerromorpha deposited in Brazilian collections provided additional new distributional information for several species, especially those of the families Gerridae and Veliidae. The results of these studies are herein presented. Material from the Coleção Entomológica Prof. José Alfredo Pinheiro Dutra, Universidade Federal do Rio de Janeiro (DZRJ) and Museu Nacional, Universidade Federal do Rio de Janeiro (MNRJ) has been examined. The following abbreviations are used for Brazilian states: *Northern region* – Roraima (RR), Amapá (AP), Pará (PA), Amazonas (AM), Tocantins (TO), Rondônia (RO), Acre (AC); *Northeastern region* – Maranhão (MA), Piauí (PI), Ceará (CE), Rio Grande do Norte (RN), Paraíba (PB), Pernambuco (PE), Bahia (BA), Alagoas (AL), Sergipe (SE); *Central-Western region* – Mato Grosso (MT), Goiás (GO), Distrito Federal (DF), Mato Grosso do Sul (MS); *Southeastern region* – Minas Gerais (MG), Espírito Santo (ES), São Paulo (SP), Rio de Janeiro (RJ); *Southern region* – Paraná (PR), Santa Catarina (SC), Rio Grande do Sul (RS). The distribution of each species in Brazil, given at state

level, follows Moreira *et al.* (2011b) and Moreira (2012).

## FAMILY GERRIDAE

*Brachymetra albinervis albinervis* (Amyot and Serville, 1843)

Known distribution in Brazil. PA, AM, CE, MT, BA, MG, SP, RJ.

Examined material. SP – Assis, Água Paulista, stream, 10.III.2010, (F.F. Moreira): 1 macropterous male, 2 macropterous females, 1 apterous female (DZRJ) [First record from Assis municipality]. Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, Trilha do Tronco, forest stream, 15.XII.1992, (E.R. Calil and M.E. Felix): 3 apterous males, 1 apterous female (DZRJ); 19.I.1993: 1 apterous male, 3 apterous females (DZRJ); Núcleo Picinguaba, Paciência River, near bridge, 31.V-02.VI.2007, (F.F. Moreira): 86 apterous males, 124 apterous females, 30 nymphs (DZRJ). RJ – Angra dos Reis, Ilha Grande, Cachoeira River, 17.III.1994: 1 apterous male, 4 apterous females (DZRJ); Ilha Grande, Parnaioca Beach, first order forest stream, 29.XII.2008, (F.F. Moreira and L. L. Dumas): 3 apterous males, 2 apterous females, 5 nymphs (DZRJ).

*Brachymetra lata* Shaw, 1933

Known distribution in Brazil. AP, PA, AM, MT, RO.

Examined material. AM – Rio Preto da Eva, PDBFF, stream, Km 41 Reserve, 04.VIII.2000, 02°24'25" S 59°46'42" W, (J.L. Nessimian): 2 macropterous females (DZRJ); ZF3, PDBFF, Km 23, Fazenda Esteio / Colosso stream, 02°24'34.89" S 59°52'03.23" W 12.II.2001, (J.L. Nessimian): 1 apterous male, 1 apterous female (DZRJ).

*Cylindrostethus erythrops* (Herrich-Schäffer, 1850)

Known distribution in Brazil. RR, PA, AM, RO.

Examined material. MT – Manso River, 26.II.1988: 1 apterous male, 1 apterous female, 2 nymphs [First record from Central-Western region].

*Cylindrostethus palmaris* Drake and Harris, 1934  
 Known distribution in Brazil. AP, PA, AM, MT, RO, MG, SP, RJ.  
 Examined material. MT – Nova Xavantina, Mortes River, VII.1983: 1 apterous male (DZPJ) [First record from Nova Xavantina municipality].

*Halobatopsis delectus* Drake and Harris, 1941  
 Known distribution in Brazil. MG.  
 Examined material. RJ – Nova Friburgo, Macaé de Cima, 22°24'46.00" S 42°31'16.20" W, 11-13.IX.2008, (V.P. Alecrim): 8 apterous males, 7 apterous females (DZPJ); Macaé River Dam, 22°25'51.90" S 42°32'18.90" W, 30.XI.2008, (N. Ferreira-Jr.): 1 apterous male, 1 apterous female (DZPJ) [First record from state of Rio de Janeiro].

*Halobatopsis platensis* (Berg, 1879)  
 Known distribution in Brazil. MT, MG, DF, SP, RJ, RS.  
 Examined material. SP – São José do Barreiro, Barreiro Stream, 04.X.2007, (R. Mugnai, A.L. Henriques-Oliveira and J.L. Nessimian): 1 apterous male, 1 nymph (DZPJ) [First record from São José do Barreiro municipality]. Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, Paciência River, near mouth, 31.V-02.VI.2007, 112 apterous males, 98 apterous females, 410 nymphs (DZPJ). PR – Guarapeçaba, Pire River, tributary to Cachoeira River, Rio Pequeno road, 25°17'32.6" S 48°17'32.6" W, 05.IV.2008, (Britto, Buckup, Villa-Verde, Bartoletti, Duboc and Ingenito): 1 apterous female (DZPJ) [First record from state of Paraná].

*Halobatopsis spiniventris* Drake and Harris, 1936  
 Known distribution in Brazil. SP, SC.  
 Examined material. RS – Santiago, Ernesto Alves, river under wooden bridge, 29°21'36" S 55°43'48" W, 01.V.2011, (J.F. Barbosa): 3 apterous males, 8 apterous females, 4 nymphs (DZPJ) [First record from state of Rio Grande do Sul].

*Limnogonus aduncus aduncus* Drake and Harris, 1933  
 Known distribution in Brazil. PA, AM, MT, MG, ES, SP, RJ, SC.  
 Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Gelado Lake, 05°57'56" S 50°10'22" W, 03.III.2008, (A.P.M. Santos and N. Ferreira-Jr.): 8 apterous males, 1 apterous female, 5 nymphs (DZPJ). MT – Chapada dos Guimarães, Namorados Waterfall, 18.II.2000, (J.L. Nessimian): 1 macropterous male (DZPJ). ES – Conceição da Barra, pond, 18°38'03" S 39°48'50" W, 01.V.2009, (N. Ferreira-Jr.): 1 macropterous male, 2 nymphs (DZPJ). RJ – Angra dos Reis, Ilha Grande, 20-28.II.1984, (Carvalho-Sampaio): 2 apterous males (DZPJ) [First record from Parauapebas, Chapada dos Guimarães, Conceição da Barra, and Angra dos Reis municipalities]. PR – Guarapeçaba, Rio do Pire, tributary to Cachoeira River, Rio Pequeno road, 25°17'32.6" S 48°17'32.6" W, 05.IV.2008, (Britto, Buckup, Villa-Verde, Bartoletti, Duboc and Ingenito): 1 apterous female (DZPJ) [First record from state of Paraná].

*Limnogonus ignotus* Drake and Harris, 1934  
 Known distribution in Brazil. PA, MT, DF, MG, MS, SC, RS.  
 Examined material. RJ – Maricá, Restinga de Maricá, 1996:

1 apterous male, 1 apterous female (DZPJ) [First record from state of Rio de Janeiro].

*Limnogonus profugus* Drake and Harris, 1930  
 Known distribution in Brazil. MT, GO, MG, MS, SP, RJ.  
 Examined material. PB – Lucena, Mangereba Farm, near irrigation tank, 08.IX.2001, (C.N. Francischetti): 1 macropterous male (DZPJ) [First record of a Gerromorpha from state of Paraíba]. MG – Jaboticatubas, road to entrance of Serra do Cipó National Park, tributary to Cipó River, 22.IV.2010, (A.P.M. Santos and L.L. Dumas): 2 apterous males, 1 apterous female (DZPJ). SP – Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, pond, 29.VI.2008, (F.F.F. Moreira): 1 apterous male (DZPJ) [First record from Jaboticatubas and Ubatuba municipalities].

*Limnogonus recurvus* Drake and Harris, 1930  
 Known distribution in Brazil. PA, AM, MT, RO, MG.  
 Examined material. SP – Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, 07.VI.2008, (N. Ferreira-Jr.): 1 apterous female (DZPJ) [First record from state of São Paulo].

*Metrobates plaumanni plaumanni* Hungerford, 1951  
 Known distribution in Brazil. SC.  
 Examined material. RJ – Lídice, Piraí River, 02.X.2007, (A.L. Henriques-Oliveira and J.L. Nessimian): 1 apterous male, 1 apterous female (DZPJ) [First record from state of Rio de Janeiro].

*Neogerris lubricus* (White, 1879)  
 Known distribution in Brazil. PA, AM, MT, RO, MG, SP.  
 Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Gelado Lake, 05°57'56" S 50°10'22" W, 22.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 1 apterous male, 5 apterous females, 2 nymphs (DZPJ) [First record from Parauapebas municipality]. MS – Aquidauana, Rio Negro Farm, baia, 06.IX.2007, (J.L. Nessimian): 4 apterous males, 1 macropterous female, 2 nymphs (DZPJ). RJ – Maricá, Restinga de Maricá, 21.I.1998, (E.R. da Silva): 1 apterous male (DZPJ); 11.IV.1996: 1 apterous male (DZPJ) [First record from states of Mato Grosso do Sul and Rio de Janeiro].

*Neogerris magnus* (Kuitert, 1942)  
 Known distribution in Brazil. AP, PA, AM.  
 Examined material. PA – Canaã dos Carajás, FLONA Carajás, Serra Sul, pool, 23.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 9 macropterous males, 9 macropterous females (DZPJ) [First record from Canaã dos Carajás municipality].

*Rheumatobates bonariensis* (Berg, 1898)  
 Known distribution in Brazil. SP, SC, RS.  
 Examined material. SP – Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, near mouth of Paciência River, 02.VI.2009, (F.F.F. Moreira): 20 apterous males, 17 apterous females, 28 nymphs (DZPJ) [First record from Ubatuba municipality].

*Rheumatobates crassifemur crassifemur* Esaki, 1926  
 Known distribution in Brazil. PA, MT, MG, SP, RJ.

Examined material. MS – Ladário, pantanal, lake near Pousada Vitória Régia, 13.IX.2008, (A.M. Sanseverino): 12 apterous males, 67 apterous females (DZRJ) [**First record from state of Mato Grosso do Sul**].

#### *Rheumatobates klagei* Schroeder, 1931

Known distribution in Brazil. PA, AM.

Examined material. AM – Manaus, Rio Negro, Anavilhanas Archipelago, Prato Lake, 30.VII.2000, (J.L. Nessimian): 3 apterous males, 22 apterous females, 35 nymphs (DZRJ) [**First record from Manaus municipality**].

### FAMILY HYDROMETRIDAE

#### *Hydrometra argentina* Berg, 1879

Known distribution in Brazil. AP, PA, AM, MT, BA, MG, MS, SP, RJ, PR, SC, RS.

Examined material. PB – Itaporoca, Ipioca River, Ipioca de Baixo Farm, 07.IX.2001, (C.N. Francischetti): 1 macropterous male (DZRJ) [**First record from state of Paraíba**]. RJ - São Fidélis, São Geraldo Farm, stream/pond, 21°41'03" S 41°50'43" W, 07.II.2009, (F.F.F. Moreira and N. Ferreira-Jr.): 1 macropterous female (DZRJ) [**First record from São Fidélis municipality**].

#### *Hydrometra comata* Torre-Bueno, 1926

Known distribution in Brazil. MT.

Examined material. PA – Barcarena, Dendê Stream, Braço Norte, 01°33'58" S 48°44'48" W, VIII.2006, (J.L. Nessimian): 1 brachypterous male (DZRJ) [**First record from Northern region**].

#### *Hydrometra fruhstorferi* Hungerford and Evans, 1934

Known distribution in Brazil. ES, SC.

Examined material. RJ – Nova Friburgo, Bonito River, ramalhete, 22°24'38.5" S 42°20'40.7" W 06.III.2009, (V.P. Alecrim): 1 apterous female (DZRJ) [**First record from state of Rio de Janeiro**].

### FAMILY MESOVELIIDAE

#### *Mesovelia amoena* Uhler, 1894

Known distribution in Brazil. PA, AM, MT, RO, MG, ES, SP, RJ.

Examined material. PA – Parauapebas, FLONA Carajás, Lake N4-B, 06°06'09" S 50°11'15" W, IV.2011: 1 apterous female (DZRJ). Canaã dos Carajás, FLONA Carajás, S11B-B, 06°21'06.58" S 50°23'36.86" W, IV.2011: 2 apterous females, 1 macropterous female, 1 nymph (DZRJ). CE – Caucaia, Lagamar do Cauípe, 18.XII.2007, (N. Ferreira-Jr.): 1 apterous female (DZRJ) [**First record from Northeastern region**]. ES – Conceição da Barra, pond, 18°38'03" S 39°48'50" W, 01.V.2009, (N. Ferreira-Jr.): 1 macropterous female (DZRJ). Alegre, Celina, Cachoeira da Fumaça State Park, Braço Norte direito River, Fumaça Waterfall, 20°37'52.5" S 41°36'22.1" W, 28.II.2011, (L.L. Dumas, G. Jardim, J.L. Nessimian): 1 macropterous female (DZRJ). SP – Assis, Centro Social Urbano, lake, 10.III.2010, (F.F.F. Moreira): 2 apterous females (DZRJ) [**First record from Conceição da Barra, Alegre, and Assis municipalities**].

#### *Mesovelia bila* Jaczewski, 1928

Known distribution in Brazil. PR.

Examined material. SP – Ubatuba, Serra do Mar State Park, Núcleo Picinguaba, pool on road to Casa da Farinha, 29.VI.2006, (N. Ferreira-Jr. and R.B. Braga): 1 apterous male (DZRJ) [**First record from Southeastern region**].

#### *Mesovelia mulsanti* White, 1879

Known distribution in Brazil. AP, PA, AM, PE, MT, RO, BA, GO, MG, SP, RJ, PR, SC, RS.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 1, 06°06'14" S 50°08'13" W, 11.IX.2011: 1 macropterous male, 1 macropterous female (DZRJ). CE – São Gonçalo do Amarante, Guaribas Stream, 19.XII.2007, (N. Ferreira-Jr.): 2 apterous males, 1 apterous female (DZRJ); Pecém, APA do Pecém Lake, 14.IV.2008, (J.L. Nessimian): 1 male with broken wings, 1 macropterous female, 1 female with broken wings, 4 nymphs (DZRJ); Comunidade do Cauípe, Talos Lake, 20.XII.2007, (N. Ferreira-Jr.): 2 males with broken wings, 1 female with broken wings (DZRJ). Caucaia, Lagamar do Cauípe, 18.XII.2007, (N. Ferreira-Jr.): 2 apterous females, 1 nymph (DZRJ); 16.IV.2008, (J.L. Nessimian): 2 apterous males, 1 apterous female, 1 macropterous female, 5 nymphs (DZRJ) [**First record from state of Ceará**]. SP – Assis, Centro Social Urbano, lake, 10.III.2010, (F.F.F. Moreira): 3 apterous males, 2 apterous females (DZRJ). RJ – Angra dos Reis, Ilha Grande, 20-28.II.1984, (Carvalho-Sampaio): 8 apterous females (DZRJ) [**First record from Assis and Angra dos Reis municipalities**].

### FAMILY VELIIDAE

#### *Euvelia lata* Polhemus and Polhemus, 1984

Known distribution in Brazil. PA, AM.

Examined material. AM – Manaus, Rio Negro, Anavilhanas Archipelago, Prato Lake, 30.VII.2000, (J.L. Nessimian): 2 apterous males, 3 apterous females (DZRJ).

#### *Husseyella halophila* Drake, 1958

Known distribution in Brazil. ES, SC.

Examined material. BA – Mucuri, Mucuri River, 24.VII.1988: 9 apterous males, 8 apterous females (DZRJ) [**First record from Northeastern region**].

#### *Microvelia ayacuchana* Drake and Maldonado-Capriles, 1952

Known distribution in Brazil. PA, ES.

Examined material. PA – Canaã dos Carajás, FLONA Carajás, Serra Sul, S11D-B, pools in cave, 06°24'12.47" S 50°18'36.51" W, 14.III.2006, (N. Ferreira-Jr.): 1 apterous male (DZRJ) [**First record from Canaã dos Carajás municipality**].

#### *Microvelia longipes* Uhler, 1894

Known distribution in Brazil. AM, MG, MS, ES, SP, RJ, SC.

Examined material. AM – Eirunepé, Juruá River, 1950, (J.C.M. Carvalho): 2 apterous males, 2 macropterous males, 1 apterous female, 2 macropterous females (MNRJ). [**First record from Eirunepé municipality**]. BA – Juazeiro, Juremal, road to Juazeiro, V.1974, (J.C.M. Carvalho): 13 macropterous males, 16 macropterous females (MNRJ) [**First Record from Northeastern region**].

*Microvelia mimula* White, 1879

Known distribution in Brazil. PA, AM, MT, MG, MS, ES, SP, RJ, SC.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, ETA, U.V. light trap, 06°04'56" S 50°09'06" W, III.2005: 1 macropterous male (DZRJ) [First record from Parauapebas municipality]. CE – Caucaia, Cauípe River, under bridge at road CE-085, 15.IV.2008, (J.L. Nessimian): 1 apterous male (DZRJ) [First record from Northeastern region].

*Microvelia picinguaba* Moreira and Barbosa, 2011

Known distribution. SP.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 1, 06°06'14" S 50°08'13" W, 02.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 9 macropterous males (DZRJ); 23.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 29 macropterous males, 24 macropterous females (DZRJ) [First record from Northern region].

*Microvelia pulchella* Westwood, 1834

Known distribution in Brazil. PA, AM, PE, MG, MS, ES, SP, RJ, SC.

Examined material. PA – Belém, 09.IX.1938, (E.J. Hambleton): 1 macropterous male (MNRJ). Parauapebas, FLONA Carajás, Serra Norte, ETA, U.V. light trap, 06°04'56" S 50°09'06" W, III.2005: 2 macropterous males, 2 macropterous females (DZRJ); 26.II.2008, (A.P.M. Santos and N. Ferreira-Jr.): 1 macropterous male (DZRJ); N4A, 06°06'06" S 50°11'05" W, 09.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 4 macropterous males, 4 apterous females, 5 macropterous females, 8 nymphs (DZRJ); N4D, 06°05'43.39" S 50°11'15.60" W, 21.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 3 apterous males, 2 macropterous male, 4 apterous females, 1 macropterous female, 2 nymphs (DZRJ); Buritizal 1, U.V. light trap, 06°06'14" S 50°08'13" W, 11.IX.2006, (N. Ferreira-Jr.): several macropterous males and females (DZRJ); 26.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 4 macropterous males, 2 macropterous female (DZRJ); Gelado Lake, 05°57'56" S 50°10'22" W, 22-26.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 3 apterous males, 7 macropterous males, 7 apterous females, 9 macropterous females (DZRJ); 03.III.2008, (A.P.M. Santos and N. Ferreira-Jr.): 1 macropterous male, 2 macropterous females (DZRJ). ETA II, 06°05'17" S 50°08'50" W, 26.II.2008, (A.P.M. Santos and N. Ferreira-Jr.): 8 apterous males, 1 macropterous male, 4 apterous females (DZRJ). Canaã dos Carajás, FLONA Carajás, Serra Sul, S11A-A, 06°21'20" S 50°26'46" W, III.2006, (N. Ferreira-Jr.): 2 apterous males, 2 apterous females, 1 macropterous male, 1 macropterous female (DZRJ); S11D-A, 06°24'12" S 50°18'28" W, IV.2011: 1 apterous male, 2 apterous females, 1 nymph (DZRJ); S11D-E, 06°23'57" S 50°21'09" W, III.2006, (N. Ferreira-Jr.): 1 macropterous male (DZRJ); 14.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 1 macropterous male (DZRJ); Leito de Ferro Stream, 06°21'29" S 50°23'59" W, 27.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 1 macropterous male, 2 macropterous females (DZRJ) [First record from Belém, Parauapebas, and Canaã dos Carajás municipalities]. MA – São Luís, Lagoa Mapaúra, 02°34'35" S 44°21'04" W, 26.VI.2008, (J.L. Nessimian): 1 macropterous male

(DZRJ). BA – Juazeiro, Juremal, road to Juazeiro, V.1974, (J.C.M. Carvalho): 8 macropterous males, 1 apterous female, 16 macropterous females (MNRJ). Ilhéus, Norte Beach, 2004, (I.C. Nascimento): 2 macropterous males, 7 macropterous females (DZRJ) [First record from states of Maranhão and Bahia]. AL – Delmiro Gouveia, Chafé, Xingó, 20-25.III.1992, (R. Sachsse): 1 macropterous male, 1 macropterous female (DZRJ) [First record of a Gerromorpha from state of Alagoas].

*Microvelia ubatuba* Moreira and Barbosa, 2011

Known distribution in Brazil. SP.

Examined material. AM – Manaus, Rio Negro, Anavilhanas Archipelago, Prato Lake, 18.IV.1982, (J.L. Nessimian): 16 macropterous males, 15 macropterous females; Xidaua Lake, 19.IV.1982: 10 macropterous males, 8 macropterous females. [First record from Northern region].

*Microvelia urucara* Moreira, Barbosa and Nessimian, 2011

Known distribution in Brazil. PA, AM.

Examined material. PA – Canaã dos Carajás, Floresta Nacional de Carajás, Leito de Ferro Stream, 01.III.2008, (A.P.M. Santos): 1 apterous male (DZRJ) [First record from Canaã dos Carajás municipality].

*Microvelia venustatis* Drake and Harris, 1933

Known distribution in Brazil. PA, AM, MG, ES, SP, RJ, SC.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 1, 06°06'14" S 50°08'13" W, 21-23.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 1 apterous male, 7 macropterous males, 10 macropterous females (DZRJ). Canaã dos Carajás, FLONA Carajás, Serra Sul, Leito de Ferro Stream, 06°21'29" S 50°23'59" W, 15.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 2 macropterous males, 1 macropterous female (DZRJ); S11D-E, 06°23'57" S 50°21'09" W, 13.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 2 macropterous males, 2 macropterous females (DZRJ) [First record from Parauapebas and Canaã dos Carajás municipalities]. MA – São Luís, Mapaúra Lake, 02°34'35" S 44°21'04" W, 26.VI.2008, (J.L. Nessimian): 1 apterous male (DZRJ). [First Record from Northeastern region].

*Oiovelia brasiliensis* Moreira, Nessimian and Rúdio, 2010

Known distribution. ES, SP, RJ.

Examined material. RS – Santiago, Ernesto Alves, stream, 29°21'36" S 55°43'48" W, 30.IV.2011, (J.F. Barbosa): 1 apterous male (DZRJ) [First record from Southern region].

*Paravelia capixaba* Moreira, Nessimian and Rúdio, 2010

Known distribution in Brazil. AM, ES.

Examined material. AM – Rio Negro, Anavilhanas Archipelago, 02.VIII.2000, (Takiya, Schwartz, Bonato, Hanazaki, Vasconcelos, Zuanon, Mesquita and Santos): 1 apterous male (DZRJ). PA – Paragominas, Capim River, 16.I.2001, (N. Ferreira-Jr.): 1 apterous female (DZRJ) [First record from state of Pará].

*Rhagovelia elegans* Uhler, 1894

Known distribution in Brazil. AP, PA, AM, MT, ES, RJ.

Examined material. PA – Barcarena, Dendê Stream, braço

norte, 01°33'58" S 48°44'48" W, VIII.2006, (J.L. Nessimian): 1 apterous male, 6 apterous females (DZRJ). Parauapebas, FLONA Carajás, Buritizal 1, 06°06'14" S 50°08'13" W, 16.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 1 apterous male, 4 apterous females, 3 nymphs (DZRJ); 25-28.IX.2007, (N. Ferreira-Jr. and V.P. Alecrim): 57 apterous males, 50 apterous females (DZRJ); 05-07.III.2008, (A.P.M. Santos and N. Ferreira-Jr.): 8 apterous males, 9 apterous females, 4 nymphs (DZRJ) [**First record from Barcarena and Parauapebas municipalities**]. SE – Areia Branca, Água Fria Stream, 10°45'17.58" S 37°20'31.50" W, 18.III.2004, (C.N. Francischetti): 1 apterous male (DZRJ) [**First record of a Gerromorpha from state of Sergipe**].

*Rhagovelia evidis* Bacon, 1948

Known distribution in Brazil. AM.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Sul, Buritizal 2, 06°04'11" S 49°56'59" W, 08.IX.2006, (N. Ferreira-Jr. and L.L. Dumas): 1 apterous female, 1 nymph (DZRJ); Buritizal 1, 06°06'14" S 50°08'13" W, 25-28.IX.2007 (N. Ferreira-Jr. and V.P. Alecrim): 10 apterous females (DZRJ) [**First record from state of Pará**]. AM – Rio Preto da Eva, ZF3, PDBFF, stream, Km 41 Reserve, 02°24'25" S 59°46'42" W, IX.1999, (J. Botero): 1 apterous female (DZRJ); 04-06.VIII.2000, (J. L. Nessimian): 4 apterous females (DZRJ); ZF3, PDBFF, Km 23, Fazenda Esteio / C. Frio, stream, 02°24'08" S 59°54'15" W, 23.X.2001, (J.L. Nessimian): 1 apterous female (DZRJ) [**First record from Rio Preto da Eva municipality**].

*Rhagovelia hambletoni* Drake and Harris, 1933

Known distribution. MG, ES, SP, RJ.

Examined material. BA – Mucuri, 26.VIII.1988: 3 apterous males, 2 apterous females (DZRJ) [**First record from Northeastern region**].

*Rhagovelia lucida* Gould, 1931

Known distribution in Brazil. SP, RJ, PR, SC, RS.

Examined material. SC – Blumenau, Spitzkopf Ecological Park, Caeté River, Schadrak Waterfall, 27°00'23.10" S 49°07'01.80" W, 21.I.2011, (A.P.M. Santos, D.M. Takiya, J.L. Nessimian): 2 apterous males (DZRJ) [**First record from Blumenau municipality**].

*Rhagovelia mangle* Moreira, Nessimian and Rúdio, 2010

Known distribution. ES.

Examined material. BA – Mucuri, 24.VIII.1988: 4 apterous males, 6 apterous females (DZRJ) [**First record from Northeastern region**].

*Rhagovelia rivulosa* Polhemus and Polhemus, 1985

Known distribution. MG, SC.

Examined material. MT – Nova Xavantina, 1947, (J.C.M. Carvalho): 3 apterous males, 3 apterous females (MNRJ) [**First record from Central-Western region**].

*Rhagovelia robusta* Gould, 1931

Known distribution in Brazil. GO, MG, ES, SP, RJ, SC.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 1, 06°04'11" S 49°56'59" W, 25-28.IX.2007 (N. Ferreira-Jr. and V.P. Alecrim): 4 apterous males, 3 macropterous males, 4 apterous females (DZRJ);

05.III.2008, (A.P.M. Santos and N. Ferreira-Jr.): 3 apterous males, 1 macropterous male, 3 apterous females (DZRJ). Canaã dos Carajás, stream on way to Serra Sul, 06°15'49" S 50°18'52" W, 29.II.2008, (A.P.M. Santos and N. Ferreira-Jr.): 5 apterous males, 10 apterous females (DZRJ) [**First record from Northern region**]. SE – Areia Branca, Itabaiana Ecological Station, Negros River, 10°44'49.20" S 37°20'24.06" W, 18.VI.2004, (C.N. Francischetti): 1 apterous male, 3 apterous females, 1 macropterous female (DZRJ) [**First record from Northeastern region**].

*Rhagovelia sooretama* Moreira, Nessimian and Rúdio, 2010  
Known distribution. ES, RJ.

Examined material. PR - Guaraqueçaba, Pire River, tributary to Rio da Cachoeira, Rio Pequeno Road, 25°17'32.6" S 48°17'32.6" W, 05.IV.2008, (Britto, Buckup, Villa-Verde, Bartoletti, Duboc and Ingenito): 1 apterous male (DZRJ) [**First record from Southern region**].

*Rhagovelia thaumana* Drake, 1959

Known distribution. PR.

Examined material. RS – Santiago, Ernesto Alves, stream under wooden bridge, 29°21'36" S 55°43'48" W, 01.V.2011, (J.F. Barbosa): 2 apterous males, 1 apterous female (DZRJ) [**First record from state of Rio Grande do Sul**].

*Rhagovelia whitei* (Breddin, 1898)

Known distribution in Brazil. PA, MT, GO, MG.

Examined material. PA – Canaã dos Carajás, FLONA Carajás, Serra Sul, Leito de Ferro Stream, 06°21'29" S 50°23'59" W, 29.III.2008, (A.P.M. Santos and N. Ferreira-Jr.): 1 apterous male, 2 apterous females, 2 nymphs (DZRJ) [**First record from Canaã dos Carajás municipality**]. MA – São Luís, unnamed stream, 02°34'44" S 44°20'41" W, 26.VI.2008, (J.L. Nessimian): 1 apterous male, 2 apterous females, 1 macropterous female (DZRJ); spring of Buenos Aires Stream, 02°35'10" S 44°20'09" W, 26.VI.2008, (J.L. Nessimian): 1 apterous female (DZRJ) [**First record from Northeastern region**]. MT – Chapada dos Guimarães, Salgadeira River, 22.II.2000, (A.L. Carvalho): 1 apterous male, 2 apterous females (DZRJ).

*Steinovelia virgata* (White, 1879)

Known distribution in Brazil. AM, MT, MG, SC.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 1, 06°06'14" S 50°08'13" W, 02.IX.2006, (N. Ferreira-Jr and L.L. Dumas): 1 macropterous female (DZRJ) [**First record from state of Pará**]. AM – Rio Negro, Anavilhanas Archipelago, 02.VIII.2000, (Takiya, Schwartz, Bonato, Hanazaki, Vasconcelos, Zuanon, Mesquita and Santos): 1 micropterous female (DZRJ).

*Stridulivelia raspa* (Hungerford, 1929)

Known distribution in Brazil. AM.

Examined material. AM – Rio Negro, Anavilhanas Archipelago, 02.VIII.2000, (Takiya, Schwartz, Bonato, Hanazaki, Vasconcelos, Zuanon, Mesquita and Santos): 1 micropterous female (DZRJ).

*Stridulivelia stridulata* (Hungerford, 1929)

Known distribution in Brazil. AP, PA, AM.

Examined material. AM – Rio Preto da Eva, ZF3, PDBFF,

stream, Km 41 Reserve, 02°24'25" S 59°46'42" W, 12.VIII.1999, (J. Botero): 1 micropterous male (DZRJ); ZF3, PDBFF, Fazenda Porto Alegre, 02°21'11" S 59°59'05" W, igarapé, 24.X.2001, (J.L. Nessimian): 1 micropterous female (DZRJ) [First record from Rio Preto da Eva municipality].

*Stridulivelia strigosa* (Hungerford, 1929)

Known distribution in Brazil. AP, PA, AM, MT.

Examined material. PA – Parauapebas, FLONA Carajás, Serra Norte, Buritizal 2, 06°04'11" S 49°56'59" W, III.2006, (N. Ferreira-Jr.): 1 alate female, 1 nymph (DZRJ) [First record from Parauapebas municipality]. AM – Rio Preto da Eva, ZF3, PDBFF, stream, Km 41 Reserve, 02°24'25" S 59°46'42" W, 12.VIII.1999, (J. Botero): 1 micropterous female (DZRJ); ZF3, PDBFF, Fazenda Esteio / C. Powell, stream, 02°23'33" S 59°52'25" W, 23.X.2001, (J.L. Nessimian): 1 micropterous male (DZRJ); ZF3, PDBFF, Km 21, Fazenda Esteio, stream, 02°26'03" S 59°54'16" W, 12.II.2001, (J.L. Nessimian): 1 micropterous female (DZRJ) [First record from Rio Preto da Eva municipality].

*Stridulivelia tersa* (Drake and Harris, 1941)

Known distribution in Brazil. AM, MT, MG, ES.

Examined material. PA – Barcarena, Pramajó Stream, tributary to Rio Pará, 01°34'02" S 48°43'15" W, 16.X.2006, (N. Ferreira-Jr.): 1 micropterous male, 4 micropterous females (DZRJ) [First record from state of Pará].

*Stridulivelia transversa* (Hungerford, 1929)

Known distribution in Brazil. AP, PA, AM.

Examined material. PA – Barcarena, Dendê Stream, Braço Norte, 01°33'58" S 48°44'48" W, VIII.2006, (J.L. Nessimian): 1 apterous male, 4 apterous females (DZRJ) [First record from Barcarena municipality]. AM – Rio Preto da Eva, ZF3, PDBFF, stream, Km 41 Reserve, 02°24'25" S 59°46'42" W, 04-06.VIII.2000, (J.L. Nessimian): 1 apterous male, 3 apterous females (DZRJ); 11.II.2001, (J.L. Nessimian): 1 apterous male (DZRJ); ZF3, PDBFF, Km 23, Fazenda Esteio / Colosso, stream, 02°24'34.89" S 59°52'03.23" W, 12.II.2001, (J.L. Nessimian): 1 apterous female (DZRJ). [First record from Rio Preto da Eva municipality]. Manaus, PDBFF, Estrada BR-174, Km 72, Fazenda Dimona, stream, 02°20'45" S 60°05'33.6" W, 06.II.2001, (J.L. Nessimian): 1 apterous male, 1 apterous female (DZRJ).

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**LITERATURE CITED**

- Andersen, N.M. 1982. The semiaquatic bugs (Hemiptera, Gerromorpha) phylogeny, adaptations, biogeography and classification. *Entomograph* 3: 1-455.
- Andersen, N.M. and J.T. Polhemus. 1980. Four new genera of Mesoveliidae (Hemiptera, Gerromorpha) and the phylogeny and classification of the family. *Entomologica Scandinavica* 11: 369-392.
- Cheng, L. 2006. A bug on the ocean waves (Heteroptera, Gerridae, *Halobates* Eschscholtz). *Denisia* 19: 1033-1040.
- Melo, A.L. and N. Nieser. 2004. Faunistical notes on aquatic and semiaquatic Heteroptera of Minas Gerais (Brazil): an annotated list of Gerromorpha and Nepomorpha collected near Januária. *Lundiana* 5: 43-49.
- Moreira, F.F.F. 2012. *Water Bugs Distributional Database*. Eletronic database accessible at <http://sites.google.com/site/distributionaldatabase>. Captured on 07 June 2012.
- Moreira, F.F.F. and J.R.I. Ribeiro. 2009. Two new *Rhagovelia* (Heteroptera: Veliidae) and new records for twelve species in Southeastern Brazil. *Aquatic Insects* 31: 45-61.
- Moreira, F.F.F. and J.F. Barbosa. 2011. The Veliidae (Hemiptera: Heteroptera: Gerromorpha) from São Paulo State, Brazil: new species, description of the male of *Microvelia ioana* Drake and Hottes, 1952, and synonimical and distributional notes. *Annales de Limnologie* 47: 297-311.
- Moreira, F.F.F., V.P. Alecrim, J.R.I. Ribeiro and J.L. Nessimian. 2011a. Identification key to the Gerridae (Insecta: Heteroptera: Gerromorpha) from the Amazon River Floodplain, Brazil, with new records for the Brazilian Amazon. *Zoologia* 28: 269-279.
- Moreira, F.F.F., J.F. Barbosa, J.R.I. Ribeiro and V.P. Alecrim. 2011b. Checklist and distribution of semiaquatic and aquatic Heteroptera (Gerromorpha and Nepomorpha) occurring in Brazil. *Zootaxa* 2958: 1-74.
- Nieser, N. 1970a. Gerridae of the Suriname and the Amazon with additional records of other neotropical species. *Studies on the Fauna of Suriname and other Guyanas* 12: 94-138.
- Nieser, N. 1970b. Hydrometridae of the Suriname and the Amazon, with additional records of other neotropical species (Hemiptera – Heteroptera). *Studies on the Fauna of Suriname and other Guyanas* 12: 139-151.
- Nieser, N. 1994. A new species and a new status in *Neogerris* Matsumura (Heteroptera: Gerridae) with a key to American species. *Storkia* 3: 27-37.
- Nieser, N. and A.L. Melo. 1999. A new species of *Halobatopsis* (Heteroptera: Gerridae) from Minas Gerais (Brazil), with a key to the species. *Entomologische Berichten* 59: 97-102.
- Polhemus, J.T. and D.A. Polhemus. 1991. A review of the veliid fauna of bromeliads, with a key and description of a new species (Heteroptera: Veliidae). *Journal of the New York Entomological Society* 99: 204-216.
- Zettel, H. 2004. *Hebrus muphyi*, new species (Heteroptera: Hebridae) from an intertidal mangrove habitat in Burias Island, Philippines. *Raffles Bulletin of Zoology* 52: 75-77.

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