

Table S5. Collection data for *Amblyomma aureolatum* samples analyzed from Brazil.

| State | Year collection | Biome | Localities | Host | Tick sex |
|-------------------|-----------------|---------------------|------------------------|-------------------------|----------------------|
| Paraná | 2015 | Atlantic Rainforest | Irati | <i>Homo sapiens</i> | 1 female |
| | | | | | |
| | 2016 | Atlantic Rainforest | União da Vitória | <i>Canis familiaris</i> | 2 females |
| | | Atlantic Rainforest | Paula Freitas | <i>Canis familiaris</i> | 1 female |
| | | Atlantic Rainforest | Antônio Olinto | <i>Canis familiaris</i> | 1 female |
| | | Atlantic Rainforest | General Carneiro | Environment | 1 female |
| | | | | <i>Canis familiaris</i> | 1 female |
| | 2017 | Atlantic Rainforest | Tijucas do Sul | <i>Homo sapiens</i> | 1 male |
| | | | | <i>Canis familiaris</i> | 6 males |
| | | Atlantic Rainforest | Paulo Frontin | <i>Homo sapiens</i> | 1 female |
| | | Atlantic Rainforest | General Carneiro | Environment | 1 female |
| | | | | <i>Felis catus</i> | 1 male |
| | | Atlantic Rainforest | Lapa | <i>Homo sapiens</i> | 1 female |
| | | Atlantic Rainforest | Araucária | <i>Canis familiaris</i> | 1 male |
| | | Atlantic Rainforest | São Mateus do Sul | Environment | 2 females |
| | | | | <i>Canis familiaris</i> | 1 female, 1 male |
| | | Atlantic Rainforest | Pinhais | <i>Canis familiaris</i> | 1 male |
| | | Atlantic Rainforest | Bituruna | <i>Felis catus</i> | 2 females |
| | | Atlantic Rainforest | General Carneiro | <i>Canis familiaris</i> | 1 female, 1 male |
| | | Atlantic Rainforest | União da Vitória | <i>Canis familiaris</i> | 1 female, 1 male |
| Santa Catarina | 2013 | Atlantic Rainforest | Lages | <i>Canis familiaris</i> | 3 males |
| | | Atlantic Rainforest | Joinville | <i>Nasua nasua</i> | 1 male |
| | | Atlantic Rainforest | Jacinto Machado | <i>Canis familiaris</i> | 2 females, 3 males |
| | 2014 | Atlantic Rainforest | Lages | <i>Canis familiaris</i> | 2 females, 1 male |
| | | Atlantic Rainforest | Balneário Piçarras | <i>Canis familiaris</i> | 1 male |
| | | Atlantic Rainforest | Florianópolis | <i>Homo sapiens</i> | 1 male |
| | | Atlantic Rainforest | Joinville | <i>Canis familiaris</i> | 2 females |
| | 2015 | Atlantic Rainforest | Jaraguá do Sul | <i>Canis familiaris</i> | 1 male |
| | | Atlantic Rainforest | Tijucas | <i>Canis familiaris</i> | 1 male |
| | 2017 | Atlantic Rainforest | Guabiruba | <i>Canis familiaris</i> | 1 male |
| | | Atlantic Rainforest | Brusque | <i>Homo sapiens</i> | 1 female, 1 male |
| Rio Grande do Sul | 2012 | Pampa | Viamão | <i>Canis familiaris</i> | 1 female |
| | 2013 | Atlantic Rainforest | São Francisco de Paula | <i>Canis familiaris</i> | 1 female, 4 males |
| | | Atlantic Rainforest | Erechim | <i>Felis catus</i> | 1 male |
| | 2014 | Atlantic Rainforest | Canela | <i>Canis familiaris</i> | 1 male |
| | | Pampa | Palmares do Sul | <i>Homo sapiens</i> | 1 female |
| Rio de Janeiro | 2015 | Atlantic Rainforest | Igrejinha | <i>Canis familiaris</i> | 6 females, 11 males |
| | | Atlantic Rainforest | Veranópolis | <i>Homo sapiens</i> | 1 male |
| | 2012 | Atlantic Rainforest | Itatiaia | <i>Canis familiaris</i> | 1 male |
| | 2013 | Atlantic Rainforest | Petrópolis | <i>Canis familiaris</i> | 6 females |
| | | | | Environment | 1 female, 2 males |
| São Paulo | 2014 | Atlantic Rainforest | Petrópolis | <i>Canis familiaris</i> | 2 females, 1 male |
| | | | | <i>Felis catus</i> | 2 females, 2 males |
| São Paulo | 2015 | Atlantic Rainforest | Santo André | <i>Canis familiaris</i> | 24 females, 9 males |
| TOTAL | | | | | 68 females, 60 males |
| | | | | | 128 specimens |