**Table 1S**. Specimens of *Saccocoelioides lamothei* analyzing; locality, host, number of specimens, GenBank accession number, and haplotype code.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Locality** | **Host** | **n** | **GenBank access** | **Haplotype** |
| **MÉXICO** |  |  |  |  |
| 1. El Huizache, Sinaloa. | *Mugil cephalus* | 3 | MW287796MW287797  MW287798 | BX  BX  BX |
| 1. La Tovara, Nayarit. | *Dormitator latifrons*  *Mugil cephalus* | 4  8 | MW287799 MW287800 MW287801  MW287802 MW287803  MW287804 MW287805 MW287806  MW287807 MW287808 MW287809  MW287810 | BQ  BR  BR  BR  BS  BT  BU  BX  BV  BX  BX  BX |
| 1. Nuevo Vallarta, Nayarit. | *Dormitator latifrons* | 5 | MW287811 MW287812 MW287813  MW287814 MW287815 | CD  CD  CD  CD  CD |
| 1. Quémaro, Jalisco. | *Dormitator latifrons*  *Mugil* sp. | 3  2 | MW287816 MW287817 MW287818  MW287819 MW287820 | BP  BP  CB  CB  CB |
| 1. Playa Punta Pérula, Jalisco. | *Mugil* sp. | 1 | MW287821 | CB |
| 1. Cuyutlán, Colima. | *Dormitator latifrons* | 5 | MW287823MW287822 MW287824 MW287825  MW287826 | BC  BD  BD  BD  BD |
| 1. Estero Tecuanillo, Colima. | *Mugil* sp. | 1 | MW287827 | AD |
| 1. Barra de Nexpa, Michoacán. | *Mugil* sp. | 4 | MW287831MW287828 MW287829 MW287830 | CE  CE  CE  CE |
| 1. Playa Las Peñitas, Guerrero. | *Mugil* sp. | 12 | MW287834MW287832 MW287835 MW287838  MW287836 MW287837MW287833 MW287839  MW287840 MW287841 MW287842  MW287843 | CE  BZ  CG  CA  CB  CB  CB  CB  CB  CB  CB  CB |
| 1. Tres Palos, Guerrero. | *Dormitator latifrons* | 2 | MW287784MW287785 | BJ  BJ |
| 1. Marquelia, Guerrero. | *Mugil curema* | 2 | MW287844 MW287845 | BM  BN |
| 1. Río Salado, Oaxaca. | *Poeciliopsis gracilis*  *Poecilia sphenops* | 2  1 | MW287846 MW287847  MW287848 | CC  CC  CC |
| 1. San José de las Flores, Oaxaca. | *Profundulus* sp.  *Sicydium multipunctatum* | 3  3 | MW287852 MW287853 MW287854  MW287850MW287849 MW287851 | AK  AL  AM  AO  AN  AN |
| 1. Chacahua, Oaxaca. | *Dormitator latifrons* | 10 | MW287786MW287787MW287788MW287790MW287789MW287791  MW287792MW287794MW287793MW287795 | AP  AP  AP  AP  AQ  AR  AS  AU  AT  AT |
| 1. Barra de Navidad, Oaxaca. | *Mugil cephalus* | 2 | MW287855 MW287856 | AI  AJ |
| 1. Matías Romero, Oaxaca. | *Poecilia mexicana* | 1 | MW287857 | CE |
| 1. La Ventosa, Oaxaca. | *Mugil cephalus* | 3 | MW287861MW287859 MW287860 | CE  CC  CC |
| 1. Pijijiapan, Chiapas. | *Dormitator latifrons* | 2 | MW287862 MW287863 | BK  BL |
| 1. Puerto Chiapas, Chiapas. | *Mugil* sp. | 5 | MW287864 MW287865 MW287866  MW287868MW287867 | AZ  AZ  BA  BA  BB |
| **GUATEMALA** |  |  |  |  |
| 1. Río Nahualate. | *Poeciliopsis gracilis*  *Poecilia mexicana* | 2  1 | MW287871 MW287872MW287870 | AV  AX  AY |
| 1. Puerto San José. | *Mugil curema* | 2 | MW287873 MW287874 | BA  BA |
| 1. Las Lisas. | *Dormitator latifrons* | 2 | MW287875 MW287876 | BY  BY |
| **EL SALVADOR** |  |  |  |  |
| 1. Río Sunza. | *Poecilia mexicana*  *Sicydium* sp. | 2  2 | MW287880MW287879MW287877 MW287878 | CF  CF  CF  CF |
| 1. Río Banderas. | *Agonostomus monticola*  *Awaous banana* | 2  3 | MW287883 MW287884MW287881 MW287882 MW287885 | AE  AF  AG  AH  AH |
| 1. Bahía de San Antonio. | *Dormitator latifrons* | 3 | MW287886 MW287887 MW287888 | AA  BY  CB |
| **HONDURAS** |  |  |  |  |
| 1. Río Choluteca, Honduras. | *Poecilia mexicana* | 2 | MW287889 MW287890 | AB  AC |
| **NICARAGUA** |  |  |  |  |
| 1. Río Tamarindo, Nicaragua. | *Agonostomus monticola*  *Poecilia gillii*  *Sicydium* sp. | 2  2  3 | MW287894 MW287895 MW287896  MW287897MW287891 MW287893MW287892 | BE  BF  BG  BH  BF  BF  BI |
| 1. Río Mico, Nicaragua. | *Poecilia gillii* | 3 | MW287898 MW287899 MW287900 | AZ  AZ  AZ |
| **COSTA RICA** |  |  |  |  |
| 1. Río Ciruelas. | *Sicydium salvini*  *Poecilia gillii* | 2  2 | MW287901 MW287902  MW287903 MW287904 | BO  BO  BO  BO |