Verification of the Hardy-Weinberg equilibrium (EHW) between the observed (Ho) and expected (He) heterozygosity for the Est3 and Est2 locus of populations of *Z. indianus*. Comparisons were performed using the Chi-square test.

Sample Groups Exact test for

TEHW

|  |  |  |
| --- | --- | --- |
|  | *Est3* | *Est2* |
| *Control*  Aracaju Male | \*\* | \*\* |
| Aracaju Female | NS | -- |
| *Total* | \* | \*\* |
| *Treated*  Aracaju Male | \*\* | \*\* |
| Aracaju Female | \*\* | -- |
| *Total* | \*\*\* | \*\* |
| *Control*  Florianópolis Male | NS | NS |
| Florianópolis Female | NS | -- |
| *Total* | \* | NS |
| *Treated*  Florianópolis Male | \*\* | \* |
| Florianópolis Female | NS | -- |
| *Total* | \*\*\* | \* |
| *Treated*  Uberaba Male | NS | \* |
| Uberaba Female | \*\* | -- |
| *Total* | NS | \* |
| *Treated*  Uberaba Male | NS | \*\* |
| Uberaba Female | NS | -- |
| *Total* | NS | \*\* |

\*p<0.05, \*\*p<0.01, \*\*\*p<0.001, NS not significant, -- absent.

Roger Exact Test (Est3/Est2) and Genetic Distance (1972), modified by Wright (1978) of populations treated or not with the insecticide malathion.

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | AC | AT | FC | FT | UC | UT |
| AC | -- | *\*\*\**/NS | NS/\*\*\* | NS/*\** | NS/NS | NS/NS |
| AT | 0,173 | -- | \*\*\*/NS | NS/\*\*\* | NS/NS | NS/NS |
| FC | 0,249 | 0,357 | -- | NS/NS | \*\*/NS | NS/NS |
| FT | 0,166 | 0,298 | 0,106 | -- | \*\*\*/\*\* | NS/\*\* |
| UC | 0,052 | 0,186 | 0,281 | 0,204 | -- | NS/NS |
| UT | 0,032 | 0,183 | 0,261 | 0,170 | 0,068 | -- |

\*p<0.05, \*\*p<0.01, \*\*\*p<0.001, NS not significant, - absent. AC- Aracaju Control, AT- Aracaju Treaty, FC- Florianópolis Control, FT- Florianópolis Treaty, UC- Uberaba Control, UT- Uberaba Treaty.

|  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | AC♂ | AC♀ | AT♂ | AT♀ | FC♂ | FC♀ | FT♂ | FT♀ | UC♂ | UC♀ | UT♂ | UT♀ |
| AC♂ | -- | NS/-- | \*\*/NS | NS/-- | NS/\*\*\* | NS/-- | NS/\* | \*\*\*/-- | NS/NS | NS/-- | NS/NS | NS/-- |
| AC♀ | 0,126 | -- | --/\*\*\* | --/\*\* | --/NS | --/\*\*\* | --/\*\*\* | --/\*\*\* | --/NS | NS/-- | --/NS | --/NS |
| AT♂ | 0,179 | 0,228 | -- | NS/-- | NS/NS | NS/-- | \*\*\*/\*\*\* | \*/-- | NS/NS | NS/-- | \*\*\*/NS | \*\*/-- |
| AT♀ | 0,130 | 0,172 | 0,057 | -- | \*/-- | --/\*\*\* | --/\*\*\* | --/NS | --/\*\*\* | --/\*\* | --/\*\* | --/NS |
| FC♂ | 0,250 | 0,144 | 0,379 | 0,156 | -- | NS/-- | NS/NS | NS/-- | NS/NS | NS/-- | NS/NS | NS/-- |
| FC♀ | 0,190 | 0,107 | 0,198 | 0,152 | 0,216 | -- | --/NS | --/NS | --/NS | --/\*\*\* | --/\*\* | --/\*\* |
| FT♂ | 0,202 | 0,238 | 0,338 | 0,229 | 0,128 | 0,372 | -- | NS/-- | NS/\*\* | --/\*\*\* | \*\*/\* | --/\*\*\* |
| FT♀ | 0,231 | 0,110 | 0,283 | 0,232 | 0,248 | 0,090 | 0,334 | -- | NS/-- | --/\*\*\* | --/\*\*\* | --/\*\* |
| UC♂ | 0,100 | 0,112 | 0,231 | 0,204 | 0,294 | 0,198 | 0,271 | 0,213 | -- | --/NS | NS/NS | --/NS |
| UC♀ | 0,063 | 0,070 | 0,191 | 0,140 | 0,094 | 0,145 | 0,197 | 0,177 | 0,073 | -- | --/NS | --/NS |
| UT♂ | 0,089 | 0,065 | 0,233 | 0,191 | 0,272 | 0,168 | 0,235 | 0,167 | 0,089 | 0,0689 | -- | --/NS |
| UT♀ | 0,086 | 0,055 | 0,186 | 0,130 | 0,103 | 0,117 | 0,195 | 0,148 | 0,125 | 0,0558 | 0,067 | -- |

Exact Test (Est3/Est2) and Genetic Distance Roger (1972), modified by Wright (1978) of populations of males and females treated or not with the insecticide malathion.

\*p<0.05, \*\*p<0.01, \*\*\*p<0.001, NS not significant, - absent. AC♂- Aracaju Male Control, AC♀- Aracaju Female Control, AT♂- Aracaju Male Control, AT♀- Aracaju Female Control, FC♂- Florianópolis Male Control, FC♀ - Florianópolis Female Control, FT♂-- Florianópolis Male Control, FT♀-- Florianópolis Female Control, UC♂- Uberaba Male Control, UC♀- Uberaba Female Control, UT♂- Uberaba Male Control. UT♀- Female Treated Uberaba.