|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  |  | **Ka** | **Ks** | **Ka/Ks** |
| **PsbA** | WR | 0 | 0.0047 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps16** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbK** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbI** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **atpA** | WR | 0 | 0.0031 | 0 |
| WA | 0 | 0.0031 | 0 |
| WC | 0 | 0 | 0 |
| **atpF** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **atpH** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **atpI** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps2** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpoC2** | WR | 0.0003 | 0.0011 | 0.272727 |
| WA | 0.0003 | 0.0011 | 0 |
| WC | 0.0009 | 0.0034 | 0.264706 |
| **rpoC1** | WR | 0.0008 | 0 | 0 |
| WA | 0.0008 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpoB** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petN** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0.0432 | 0 |
| **psbM** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbD** | WR | 0 | 0 | 0 |
| WA | 0.0012 | 0 | 0 |
| WC | 0.0012 | 0 | 0 |
| **psbC** | WR | 0 | 0.003 | 0.655172 |
| WA | 0.0019 | 0.0029 | 0 |
| WC | 0.001 | 0 | 0 |
| **psbZ** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps14** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psaB** | WR | 0.0006 | 0 | 0 |
| WA | 0.0006 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psaA** | WR | 0.0006 | 0 | 0 |
| WA | 0.0006 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ycf3** | WR | 0 | 0 | 0 |
| WA |  |  | 0 |
| WC |  |  | 0 |
| **rps4** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhJ** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhK** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhC** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **atpE** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **atpB** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rbcL** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **accD** | WR | 1.2146 | 1.1855 | 1.024547 |
| WA | 1.2146 | 1.1855 | 1.024547 |
| WC | 0 | 0 | 0 |
| **psaI** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ycf4** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **cemA** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petA** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbJ** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbL** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbF** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbE** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petL** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petG** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psaJ** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl33** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps18** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl20** | WR | 0.003 | 0 | 0 |
| WA | 0.003 | 0 | 0 |
| WC | 0.003 | 0 | 0 |
| **rps12** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **clpP** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbB** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbT** | WR | 0.0119 | 0 | 0 |
| WA | 0.0119 | 0 | 0 |
| WC | 0.0119 | 0 | 0 |
| **psbN** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psbH** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petB** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **petD** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpoA** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps11** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl36** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **infA** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps8** | WR | 0.0032 | 0 | 0 |
| WA | 0.0032 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl14** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl16** | WR | 0.0033 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0.0033 | 0 | 0 |
| **rps3** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl22** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps19** | WR |  |  | 0 |
| WA |  |  | 0 |
| WC |  |  | 0 |
| **rpl2** | WR | 0.003 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rpl23** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0.0045 | 0 | 0 |
| **ycf2** | WR | 0.0008 | 0.0007 | 1.142857 |
| WA | 0.0002 | 0.0007 | 0.285714 |
| WC | 0 | 0 | 0 |
| **ndhB** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps7** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ycf1** | WR | 0.0604 | 0.045 | 1.342222 |
| WA | 0 | 0.0042 | 0 |
| WC | 0.0002 | 0 | 0 |
| **ndhF** | WR | 2.2164 | N.A | 0 |
| WA | 0.0011 | 0 | 0 |
| WC | 2.0977 | 1.8907 | 1.109483 |
| **rpl32** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ccsA** | WR |  |  | 0 |
| WA |  |  | 0 |
| WC |  |  | 0 |
| **ndhD** | WR | 0.0016 | 0 | 0 |
| WA | 0.0008 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **psaC** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhG** | WR | 0.0023 | 0 | 0 |
| WA | 0.0023 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhI** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhA** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **ndhH** | WR | 0 | 0 | 0 |
| WA | 0 | 0 | 0 |
| WC | 0 | 0 | 0 |
| **rps15** | WR | 0.0096 | 0 | 0 |
| WA | 0.0048 | 0.0199 | 0.241206 |
| WC | 0 | 0 | 0 |