**THE NUMBERS IN THE SANGER SEQUENCE FILES CORRESPOND WITH THE NUMBERS IN THIS TABLE**

**Table 1 Species level taxonomic assignment success a of barcodes from different primer pairs of selected bee species representing different families.**

|  |  |  |
| --- | --- | --- |
| **Taxon** | **LCO1490/HCO2198** | **BeeCox!F1/BeeCox1R2** |
| **Megachilidae** |  |  |
| *Anthidium punctatum* (107)b | CORRECT | CORRECT |
| *Chelostoma florisomne* (99) | CORRECT | CORRECT |
| *Coelioxys alata* (1) | CORRECT | CORRECT |
| *Coelioxys elongata* (110) | CORRECT | CORRECT |
| *Coelioxys rufescens* (108) | CORRECT | CORRECT |
| *Herides truncorum* (112) | CORRECT | CORRECT |
| *Osmia bicolor* (93) | CORRECT | CORRECT |
| *Megachile circumcincta (2)* | CORRECT | CORRECT |
| *Megachile willughbiella (104)* | CORRECT | CORRECT |
| *Megachile versicolor* (95) | CORRECT | CORRECT |
| **Andrenidae** |  |  |
| *Andrena barbilabris* (4) | CORRECT | CORRECT |
| *Andrena flavipes (6)* | WOLBACHIA | CORRECT |
| *Andrena fulvago (105)* | MIXED | CORRECT |
| *Andrena ovatula* (5) | MIXED | CORRECT |
| *Andrena ovatula* (7) | WOLBACHIA | CORRECT |
| *Andrena minutula* (15) | CORRECT | CORRECT |
| *Andrena nigroaenea* (8) | WOLBACHIA | CORRECT |
| *Andrena wilkella* (35) | MIXED | CORRECT |
| *Andrena wilkella* (36) | MIXED | CORRECT |
| *Andrena wilkella* (37) | MIXED | CORRECT |
| **Halictidae** |  |  |
| *Lasioglossum minutulum* (14) | MIXED | CORRECT |
| *Lasioglossum nitidiusculum* (41) | CORRECT | CORRECT |
| *Lasioglossum pauxillum* (49) | CORRECT | CORRECT |
| *Lasioglossum semilucens* (46) | WOLBACHIA | CORRECT |
| *Lasioglossum sexstrigatum* (16) | CORRECT | CORRECT |
| *Lasioglossum villosulum* (48) | CORRECT | CORRECT |
| *Sphecodes ferruginatus* (97) | CORRECT | CORRECT |
| *Sphecodes miniatus* (19) | CORRECT | CORRECT |
| *Sphecodes monilicornis* (18) | WOLBACHIA | CORRECT |
| *Sphecodes puncticeps* (17) | CORRECT | CORRECT |
| **Colletidae** |  |  |
| *Colletes daviesanus* (117) | WOLBACHIA | CORRECT |
| *Hylaeus brevicornis* (13) | CORRECT | CORRECT |
| *Hylaeus communis* (12) | WOLBACHIA | CORRECT |
| *Hylaeus confusus* (106) | CORRECT | CORRECT |
| **Apidae** |  |  |
| *Anthophora furcata* (102) | CORRECT | CORRECT |
| *Bombus pratorum* (101) | CORRECT | CORRECT |
| *Bombus rupestris* (91) | CORRECT | CORRECT |
| *Bombus terrestris* (72) | CORRECT | CORRECT |
| *Ceratina cyanea* (113) | MIXED | CORRECT |
| *Epeolus variegatus* (115) | CORRECT | CORRECT |
| *Eucera nigrescens* (114) | CORRECT | CORRECT |
| *Nomada fabriciana* (96) | CORRECT | CORRECT |
| *Nomada goodeniana* (92) | CORRECT | CORRECT |
| *Nomada marshamella* (98) | CORRECT | CORRECT |
| *Nomada ruficornis* (118) | MIXED | CORRECT |
| *Nomada succincta* (71) | MIXED | CORRECT |
| **Mellitidae** |  |  |
| *Melitta haemorrhoidales* (109) | CORRECT | CORRECT |
| *Melitta leporina* (M10) | MIXED | CORRECT |

a Assignment success was either given as unambiguous (correct) identification in BOLD as CORRECT, misamplification of endosymbiont as WOLBACHIA, or a sequence that showed double or mixed signal and could not be identified as MIXED.

b Number in parantheses correspond to unique identifiers with the online available sequence chromatograms and data